

**Experiment Number:** 20006 - 03  
**Test Type:** CHRONIC  
**Route:** GAVAGE  
**Species/Strain:** RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**  
Indole-3-carbinol  
**CAS Number:** 700-06-1

**Date Report Requested:** 04/16/2013  
**Time Report Requested:** 09:53:55  
**First Dose M/F:** 03/14/07 / 03/15/07  
**Lab:** BAT

F1\_HSD

**NTP Study Number:** C20006B  
**Lock Date:** 06/21/2010  
**Cage Range:** ALL  
**Date Range:** ALL  
**Reasons For Removal:** ALL  
**Removal Date Range:** ALL  
**Treatment Groups:** Include ALL  
**Study Gender:** Both  
**TDMSE Version:** 3.0.1.1\_001  
**PWG Approval Date:** NONE



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

HARLAN SPRAGUE DAWLEY RATS MALE 0 mg/kg	DAY ON TEST																				ANIMAL ID	males (cont...)						
	0 7	0 7	0 6	0 1	0 7	0 7	0 7	0 4	0 6	0 6	0 6	0 4	0 6	0 6	0 5	0 6	0 6	0 5	0 7	0 5			0 5	0 6	0 7	0 6	0 7	0 6
Mesentery																												
Artery, Inflammation, Chronic Active																												
Fat, Necrosis																												
Oral Mucosa	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Pancreas	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Acinus, Atrophy																												
Acinus, Hyperplasia	2				2		2		1		2			1	2			1	1			1	1					
Artery, Inflammation, Chronic Active							3		2	3		2		2	3	3	2		2		3		1					
Salivary Glands	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Stomach, Forestomach	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Hyperplasia	2		1	2			2				1	2		2	1		2				1				1			
Inflammation															1		3											
Necrosis																											4	
Ulcer				1													2											
Stomach, Glandular	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Epithelium, Hyperplasia					1																							
Epithelium, Inflammation, Chronic Active									1										1		1							
Epithelium, Mineralization										3						2	3					2						
Epithelium, Necrosis							1																					
Tooth																												
Necrosis																											+	3

**CARDIOVASCULAR SYSTEM**

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

HARLAN SPRAGUE DAWLEY RATS MALE 0 mg/kg	DAY ON TEST																								ANIMAL ID	males (cont...)		
	07	07	06	01	07	07	07	04	06	06	06	04	06	06	05	06	06	05	07	05	05	06	07	06			07	06
	27	27	34	97	27	28	28	50	89	31	66	82	83	85	85	99	95	33	75	29	05	75	45	20	81	00		
	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	
	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	
	01	02	03	04	05	06	07	08	09	00	01	01	01	01	01	01	01	01	01	02	02	02	02	02	02	02	05	

Blood Vessel Dilatation	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Inflammation, Chronic Active			2			2	2		2			3		2	3	3	2		1	2		2		2		
Heart Cardiomyopathy	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Mineralization Atrium, Thrombosis	2	1	2	1	1	3	2	2	3	3	3	3	2	3	3	3	3	3	3	3	2	3		3	3	
Epicardium, Inflammation															2									4		

ENDOCRINE SYSTEM

Adrenal Cortex Degeneration, Cystic	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Adrenal Cortex Degeneration, Fatty																2	1	2							2	2
Adrenal Cortex Hyperplasia						2			3						3		3				2	2	3			
Adrenal Cortex Necrosis														1												
Adrenal Medulla Angiectasis	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Adrenal Medulla Hyperplasia			2				4		1	2	3	1		2		1	1	1							1	
Islets, Pancreatic Hyperplasia	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Parathyroid Gland Hyperplasia	+	+	+	+	M	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	M	+
Pituitary Gland																										

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

HARLAN SPRAGUE DAWLEY RATS MALE 0 mg/kg	DAY ON TEST																								ANIMAL ID	males (cont...)	
	0 7 2 7	0 7 2 7	0 6 3 4	0 1 9 7	0 7 2 7	0 7 2 8	0 4 5 0	0 6 8 9	0 6 3 1	0 6 6 6	0 4 8 2	0 6 3 8	0 6 8 5	0 5 9 5	0 6 6 5	0 5 7 5	0 7 2 9	0 5 0 5	0 5 7 5	0 6 4 5	0 7 2 0	0 6 4 5	0 7 4 0	0 6 2 8			0 7 1
Pars Distalis, Hyperplasia	2				1	1	3	3				2					2				1	1			1		
Thyroid Gland	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+		
Thrombosis																											
C-cell, Hyperplasia																											
Follicular Cell, Hypertrophy		1			2					2			2	1			1	2					2	2		3	

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

Epididymis	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	
Atrophy																									
Preputial Gland	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	
Cyst		2										3	2							3	3		2		
Fibrosis												1													
Inflammation											3														
Prostate	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	
Atrophy																									
Fibrosis													2												
Hyperplasia											1														
Inflammation, Acute																							1		
Necrosis																									3
Seminal Vesicle	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	A
Testes	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	A

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

HARLAN SPRAGUE DAWLEY RATS MALE 0 mg/kg	DAY ON TEST																						males (cont...)			
	ANIMAL ID		0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0		0	0	0
	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	7	7	6	1	7	7	7	4	6	6	6	6	4	6	6	5	6	6	5	7	5	5	6	7	6	8
	2	2	3	9	2	2	2	5	8	3	6	8	3	8	8	9	9	3	7	2	0	7	4	2	8	1
	7	7	4	7	7	8	8	0	9	1	6	2	8	5	5	9	5	5	5	9	5	5	5	0	1	
	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	2	3	4	5	6	7	8	9	0	1	2	3	4	5	6	7	8	9	0	1	2	3	4	5	

Atrophy 4 4 1 1 2 3 2 2 1 1 1 3  
 Artery, Inflammation, Chronic Active 1 3 3 2 3 3 2 4 2 1 2 3  
 Interstitial Cell, Hyperplasia

HEMATOPOIETIC SYSTEM

Bone Marrow Hyperplasia	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	
																										3	
Lymph Node Mediastinal, Hemorrhage Renal, Ectasia Renal, Hemorrhage						+																				+	3
Lymph Node, Mandibular Hyperplasia, Plasma Cell	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Lymph Node, Mesenteric Hyperplasia, Lymphoid	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Spleen Hematopoietic Cell Proliferation Inflammation	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
	2	3			2	2	2		1			2					3			2	2					2	
Thymus Atrophy Epithelial Cell, Hyperplasia	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
	3	3	3	2	2	3	3		4		1	4	1	3	2	3			M	M	+	+	+	+	+	+	

INTEGUMENTARY SYSTEM

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically M .. Missing tissue  
 X .. Lesion present A .. Autolysis precludes evaluation  
 I .. Insufficient tissue BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

HARLAN SPRAGUE DAWLEY RATS MALE 0 mg/kg	DAY ON TEST																				ANIMAL ID	males (cont...)			
	0 7	0 7	0 6	0 1	0 7	0 7	0 7	0 4	0 6	0 6	0 6	0 4	0 6	0 6	0 5	0 6	0 6	0 5	0 7	0 5			0 5	0 6	0 7
	2	2	3	9	2	2	2	5	8	3	6	8	3	8	8	9	9	3	7	2	0	7	4	2	8
	7	7	4	7	7	8	8	0	9	1	6	2	8	5	5	9	5	5	5	9	5	5	5	0	1
	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
	1	2	3	4	5	6	7	8	9	0	1	2	3	4	5	6	7	8	9	0	1	2	2	2	5

Mammary Gland	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Skin	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Cyst Epithelial Inclusion		X							X										X					X	
Inflammation													1												
Epidermis, Ulcer												3													

MUSCULOSKELETAL SYSTEM

Bone	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Fibrous Osteodystrophy															3	3	3					3	3	3	3

NERVOUS SYSTEM

Brain	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
-------	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---	---

RESPIRATORY SYSTEM

Lung	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Hemorrhage, Multifocal			1																			2			
Inflammation, Chronic	1		1		2		1		1	1									1			3			1
Necrosis																							3		
Alveolar Epithelium, Hyperplasia																									
Alveolus, Infiltration Cellular, Histiocyte			1				1			1	1		1	1		1		1		1					2
Alveolus, Mineralization																									
Nose	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+	+
Foreign Body																									X
Fungus																									
Inflammation					X																				

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

HARLAN SPRAGUE DAWLEY RATS MALE 0 mg/kg	DAY ON TEST	07	07	06	01	07	07	07	04	06	06	06	06	04	06	06	05	06	06	05	07	05	05	06	07	06	07	06
	ANIMAL ID	0001	0002	0003	0004	0005	0006	0007	0008	0009	0010	0011	0012	0013	0014	0015	0016	0017	0018	0019	0020	0021	0022	0023	0024	0025	0026	0027

males  
(cont...)

Inflammation, Chronic Active  
Respiratory Epithelium, Hyperplasia

2 1 2 1 1 1 3

Trachea  
Inflammation

+  
2

SPECIAL SENSES SYSTEM

Eye  
Anterior Chamber, Inflammation, Acute  
Cornea, Inflammation, Acute

+  
1 2 2 2 4 2 2 3 3

Harderian Gland  
Pigmentation, Porphyrin

+  
3

Lacrimal Gland  
Degeneration

+  
2

URINARY SYSTEM

Kidney  
Nephropathy

+  
3 3 3 1 3 3 3 3 4 4 3 4 2 4 4 4 3 3 3 3 4 3 3 3

Urinary Bladder

+ +

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked



| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>0 mg/kg | DAY ON TEST |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | * TOTALS |    |    |
|---|-------------|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----------|----|----|
|   | 07          | 06 | 07 | 07 | 06 | 06 | 01 | 06 | 07 | 07 | 04 | 07 | 07 | 07 | 07 | 07 | 07 | 07 | 05 | 07 |          | 07 | 04 |
| ANIMAL ID                                     | 00          | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00       | 00 | 00 |
|   | 27          | 93 | 29 | 27 | 85 | 84 | 88 | 69 | 28 | 28 | 21 | 27 | 88 | 88 | 26 | 29 | 27 | 39 | 88 | 26 | 29       | 85 | 44 |

ALIMENTARY SYSTEM

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |       |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|-------|
| Esophagus                                | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Intestine Large, Cecum<br>Necrosis       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 3.0 |
| Intestine Large, Colon<br>Erosion        | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 3.0 |
| Intestine Large, Rectum                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Intestine Small, Duodenum                | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 43    |
| Intestine Small, Ileum                   | + | + | + | + | + | A | A | + | + | + | + | + | + | + | A | + | + | + | + | + | A | + | A | 35    |
| Intestine Small, Jejunum                 | + | + | + | + | + | A | A | + | + | + | + | + | + | + | + | + | + | + | + | + | A | + | + | 40    |
| Liver                                    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Angiectasis                              | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 3.0 |
| Basophilic Focus                         |   |   |   |   |   |   |   |   |   |   |   |   | X |   | X |   |   |   |   |   |   |   |   | 3     |
| Clear Cell Focus                         | X |   |   | X |   |   |   | X | X |   | X | X |   |   | X |   | X |   | X |   |   |   |   | 14    |
| Eosinophilic Focus                       |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   | X | X |   | X |   |   | 10    |
| Hepatodiaphragmatic Nodule               |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2     |
| Mixed Cell Focus                         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   | 4     |
| Necrosis                                 |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 2.3 |
| Bile Duct, Fibrosis                      |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 2.0 |
| Bile Duct, Hyperplasia                   |   |   |   | 1 | 1 |   |   | 1 |   |   |   |   |   | 1 |   |   |   |   |   |   | 1 |   |   | 7 1.1 |
| Periportal, Inflammation, Chronic Active |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 2.0 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>0 mg/kg | DAY ON TEST |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | * TOTALS |    |    |
|---|-------------|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----------|----|----|
|   | 07          | 06 | 07 | 07 | 06 | 06 | 01 | 06 | 07 | 07 | 04 | 07 | 07 | 07 | 07 | 07 | 07 | 05 | 07 | 07 |          | 07 | 04 |
| ANIMAL ID                                     | 00          | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00       | 00 | 00 |
| Mesentery                                     |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |
| Artery, Inflammation, Chronic Active          |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |
| Fat, Necrosis                                 |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |
| Oral Mucosa                                   | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +        | +  | +  |
| Pancreas                                      | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +        | +  | +  |
| Acinus, Atrophy                               |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |
| Acinus, Hyperplasia                           | 1           |    |    | 2  |    | 1  |    |    |    |    |    |    |    |    |    |    | 1  |    |    |    |          | 2  |    |
| Artery, Inflammation, Chronic Active          |             | 2  | 2  | 2  | 2  |    |    | 2  | 2  | 2  |    |    |    |    | 1  |    |    | 3  |    |    |          | 2  | 2  |
| Salivary Glands                               | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +        | +  | +  |
| Stomach, Forestomach                          | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +        | +  | +  |
| Hyperplasia                                   |             |    |    | 2  |    |    |    |    |    |    | 1  |    |    | 1  |    |    |    |    |    |    | 3        | 2  | 2  |
| Inflammation                                  |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |
| Necrosis                                      |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |
| Ulcer   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |
| Stomach, Glandular                            | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +        | +  | +  |
| Epithelium, Hyperplasia                       |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1  |    |    |    |          |    |    |
| Epithelium, Inflammation, Chronic Active      |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |
| Epithelium, Mineralization                    |             |    |    |    |    | 3  |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 2        |    | 2  |
| Epithelium, Necrosis                          |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |
| Tooth   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |
| Necrosis                                      |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |

CARDIOVASCULAR SYSTEM

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue

M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>0 mg/kg | DAY ON TEST |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | * TOTALS |    |  |
|---|-------------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----|--|
|   | 07<br>27    | 06<br>93 | 07<br>29 | 07<br>27 | 06<br>85 | 06<br>84 | 01<br>88 | 06<br>69 | 07<br>88 | 07<br>88 | 04<br>21 | 07<br>27 | 07<br>28 | 07<br>28 | 07<br>28 | 07<br>21 | 07<br>29 | 07<br>29 | 05<br>37 | 07<br>28 | 07<br>26 | 07<br>29 | 04<br>55 | 04<br>44 |          |    |  |
| ANIMAL ID                                     | 00<br>00    | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 | 00<br>00 |    |  |
| Blood Vessel Dilatation                       | +           | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | 50       |    |  |
| Inflammation, Chronic Active                  | 2           | 2        | 3        | 2        | 2        |          |          | 2        | 1        | 2        |          | 2        | 1        |          | 2        |          |          | 2        | 1        |          |          | 2        | 2        | 2        | 2        |    |  |
| Heart   | +           | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | 50       |    |  |
| Cardiomyopathy                                | 2           | 3        | 3        | 3        | 3        | 3        | 2        | 2        | 2        | 3        | 1        | 2        | 2        | 2        | 3        | 2        |          | 3        | 2        | 1        | 1        | 3        |          | 3        | 3        |    |  |
| Mineralization                                |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 47       |    |  |
| Atrium, Thrombosis                            |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 1        |    |  |
| Epicardium, Inflammation                      |             |          | 2        |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 1        |    |  |
| <b>ENDOCRINE SYSTEM</b>                       |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    |  |
| Adrenal Cortex                                | +           | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | 50       |    |  |
| Degeneration, Cystic                          |             |          | 2        |          | 2        |          |          |          |          |          |          |          | 2        |          |          |          |          |          | 2        |          |          |          |          |          | 4        |    |  |
| Degeneration, Fatty                           |             | 2        |          |          |          |          |          |          |          | 3        |          |          |          |          | 2        |          |          |          |          |          |          |          |          |          | 8        |    |  |
| Hyperplasia                                   |             |          |          |          |          |          |          |          | 3        |          |          | 1        | 1        | 4        |          | 1        | 1        |          |          |          |          |          | 3        |          | 14       |    |  |
| Necrosis                                      |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 1        |    |  |
| Adrenal Medulla                               | +           | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | 50       |    |  |
| Angiectasis                                   |             |          |          |          |          |          |          |          |          |          |          |          |          |          | 2        |          |          |          |          |          |          |          |          |          | 1        |    |  |
| Hyperplasia                                   |             |          | 3        |          |          | 2        |          |          | 2        |          | 3        |          |          |          |          |          |          | 4        | 2        |          | 4        |          |          |          | 18       |    |  |
| Islets, Pancreatic                            | +           | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | 50       |    |  |
| Hyperplasia                                   |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 2        |          | 2        |          | 3        |    |  |
| Parathyroid Gland                             | +           | +        | +        | M        | +        | +        | +        | +        | M        | M        | +        | +        | +        | +        | +        | +        | M        | +        | +        | +        | +        | +        | +        | M        | +        | 43 |  |
| Hyperplasia                                   |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 3        |    |  |
| Pituitary Gland                               | +           | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | 50       |    |  |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>0 mg/kg | DAY ON TEST |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |   |   |   |   |    |   |     | * TOTALS |       |  |
|---|-------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|---|-----|---|---|---|---|----|---|-----|----------|-------|--|
|   | 0           | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0  | 0 | 0   | 0 | 0 | 0 | 0 | 0  | 0 | 0   |          |       |  |
|   | 7           | 6 | 7 | 7 | 6 | 6 | 1 | 6 | 7 | 7 | 4 | 7 | 7 | 7 | 7 | 7  | 7 | 7   | 5 | 7 | 7 | 4 | 4  | 4 | 4   |          |       |  |
|   | 2           | 9 | 2 | 2 | 8 | 8 | 8 | 6 | 2 | 2 | 2 | 2 | 2 | 2 | 1 | 2  | 2 | 2   | 3 | 2 | 2 | 2 | 2  | 2 | 2   |          |       |  |
|   | 7           | 3 | 9 | 7 | 5 | 4 | 8 | 9 | 8 | 8 | 1 | 7 | 8 | 8 | 8 | 6  | 9 | 9   | 7 | 9 | 8 | 6 | 9  | 5 | 4   |          |       |  |
| ANIMAL ID                                     | 0           | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0  | 0 | 0   | 0 | 0 | 0 | 0 | 0  | 0 | 0   |          |       |  |
|   | 0           | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0  | 0 | 0   | 0 | 0 | 0 | 0 | 0  | 0 | 0   |          |       |  |
|   | 0           | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0  | 0 | 0   | 0 | 0 | 0 | 0 | 0  | 0 | 0   |          |       |  |
|   | 2           | 2 | 2 | 2 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 4 | 4  | 4 | 4   | 4 | 4 | 4 | 4 | 4  | 4 | 5   |          |       |  |
|   | 6           | 7 | 8 | 9 | 0 | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 0 | 1  | 2 | 3   | 4 | 5 | 6 | 7 | 8  | 9 | 0   |          |       |  |
| Pars Distalis, Hyperplasia                    |             |   | 2 |   | 4 |   | 2 |   | 1 | 1 |   | 4 |   | 3 |   | 17 |   | 2.0 |   |   |   |   |    |   |     |          |       |  |
| Thyroid Gland                                 | +           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |   |   |   |   |    |   | 50  |          |       |  |
| Thrombosis                                    |             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |   |   |   |   |    |   | 2   |          | 1 2.0 |  |
| C-cell, Hyperplasia                           |             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |   |   |   |   |    |   | 1   |          | 6 2.2 |  |
| Follicular Cell, Hypertrophy                  |             |   | 2 |   | 3 |   | 3 |   | 2 |   | 2 |   | 1 |   | 1 |    | 1 |     | 2 |   | 1 |   | 21 |   | 1.8 |          |       |  |

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

|                     |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |  |       |  |   |  |     |  |
|---------------------|---|--|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----|--|-------|--|---|--|-----|--|
| Epididymis          | + |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |  |       |  |   |  |     |  |
| Atrophy             |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 3  |  | 1 3.0 |  |   |  |     |  |
| Preputial Gland     | + |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |  |       |  |   |  |     |  |
| Cyst                |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 3  |  | 7 2.6 |  |   |  |     |  |
| Fibrosis            |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 3  |  | 1 1.0 |  |   |  |     |  |
| Inflammation        |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 3  |  | 2 3.0 |  |   |  |     |  |
| Prostate            | + |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |  |       |  |   |  |     |  |
| Atrophy             |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 2  |  | 1 2.0 |  |   |  |     |  |
| Fibrosis            |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 3  |  | 1 2.0 |  |   |  |     |  |
| Hyperplasia         | 3 |  | 2 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |  |       |  | 3 |  | 2.0 |  |
| Inflammation, Acute |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1  |  | 1.0   |  |   |  |     |  |
| Necrosis            |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1  |  | 3.0   |  |   |  |     |  |
| Seminal Vesicle     | + |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 49 |  |       |  |   |  |     |  |
| Testes              | + |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 49 |  |       |  |   |  |     |  |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>0 mg/kg | DAY ON TEST |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | * TOTALS |
|---|-------------|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----------|
|   | 07          | 06 | 07 | 07 | 06 | 06 | 01 | 06 | 07 | 07 | 04 | 07 | 07 | 07 | 07 | 07 | 07 | 07 | 05 | 07 | 07 | 04 | 04 | 04 |          |
| ANIMAL ID                                     | 00          | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 |          |
|   | 27          | 93 | 29 | 27 | 85 | 84 | 88 | 69 | 28 | 28 | 21 | 27 | 88 | 88 | 69 | 28 | 28 | 19 | 22 | 23 | 28 | 26 | 29 | 44 |          |
|   | 00          | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 |          |
|   | 00          | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 |          |
|   | 26          | 72 | 88 | 29 | 30 | 12 | 33 | 33 | 34 | 56 | 73 | 89 | 00 | 41 | 42 | 34 | 45 | 66 | 78 | 89 | 50 | 48 | 50 |    |          |

|                                      |   |   |   |   |   |  |  |   |   |   |   |  |  |   |   |   |   |   |   |  |   |   |   |   |           |            |
|--------------------------------------|---|---|---|---|---|--|--|---|---|---|---|--|--|---|---|---|---|---|---|--|---|---|---|---|-----------|------------|
| Atrophy                              | 1 | 1 | 2 | 3 | 2 |  |  | 3 | 1 | 3 | 2 |  |  | 2 | 4 | 4 | 2 | 1 | 1 |  | 1 | 2 | 4 |   | <b>30</b> | <b>2.1</b> |
| Artery, Inflammation, Chronic Active | 3 | 2 | 3 | 3 | 2 |  |  | 3 | 1 | 2 | 2 |  |  | 2 |   |   |   | 1 | 1 |  | 1 | 3 | 4 | 1 | <b>28</b> | <b>2.3</b> |
| Interstitial Cell, Hyperplasia       |   |   |   |   |   |  |  |   |   |   |   |  |  |   |   |   |   | 1 |   |  |   |   |   |   | <b>1</b>  | <b>1.0</b> |

**HEMATOPOIETIC SYSTEM**

|                                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           |            |            |            |
|----------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|-----------|------------|------------|------------|
| Bone Marrow                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +         | <b>50</b>  |            |            |
| Hyperplasia                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           | <b>1</b>   | <b>3.0</b> |            |
| Lymph Node                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           | <b>4</b>   |            |            |
| Mediastinal, Hemorrhage          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           |            | <b>1</b>   | <b>3.0</b> |
| Renal, Ectasia                   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           |            | <b>2</b>   | <b>3.5</b> |
| Renal, Hemorrhage                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           |            | <b>1</b>   | <b>3.0</b> |
| Lymph Node, Mandibular           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +         | <b>50</b>  |            |            |
| Hyperplasia, Plasma Cell         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           | <b>1</b>   | <b>2.0</b> |            |
| Lymph Node, Mesenteric           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +         | <b>50</b>  |            |            |
| Hyperplasia, Lymphoid            |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           |            | <b>1</b>   | <b>3.0</b> |
| Spleen                           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +         | <b>50</b>  |            |            |
| Hematopoietic Cell Proliferation | 3 |   | 2 |   | 2 | 2 |   | 3 | 3 |   | 3 | 2 | 2 | 2 | 2 | 2 |   | 2 | 2 | 1 |   | 2 |   | <b>28</b> | <b>2.1</b> |            |            |
| Inflammation                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           | <b>1</b>   | <b>2.0</b> |            |
| Thymus                           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | M | M | + | + | +         | <b>46</b>  |            |            |
| Atrophy                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           |            | <b>41</b>  | <b>2.2</b> |
| Epithelial Cell, Hyperplasia     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |           | <b>1</b>   | <b>2.0</b> |            |

**INTEGUMENTARY SYSTEM**

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>0 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | * TOTALS |  |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|----------|--|
|   | 0727        | 0693 | 0729 | 0727 | 0685 | 0664 | 0168 | 0678 | 0778 | 0742 | 0777 | 0777 | 0777 | 0777 | 0777 | 0777 | 0777 | 0777 | 0777 | 0777 | 0777 | 0777 | 0777 | 0777 |          |  |
| ANIMAL ID                                     | 0000        | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 |          |  |
| Mammary Gland                                 | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 50       |  |
| Skin  | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 50       |  |
| Cyst Epithelial Inclusion                     |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 5        |  |
| Inflammation                                  |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 3 2.3    |  |
| Epidermis, Ulcer                              |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 3.0    |  |
| <b>MUSCULOSKELETAL SYSTEM</b>                 |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |          |  |
| Bone  | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 50       |  |
| Fibrous Osteodystrophy                        |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 12 3.0   |  |
| <b>NERVOUS SYSTEM</b>                         |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |          |  |
| Brain   | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 50       |  |
| <b>RESPIRATORY SYSTEM</b>                     |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |          |  |
| Lung  | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 49       |  |
| Hemorrhage, Multifocal                        |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 3 1.3    |  |
| Inflammation, Chronic                         |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 17 1.6   |  |
| Necrosis                                      |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 3.0    |  |
| Alveolar Epithelium, Hyperplasia              |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 4.0    |  |
| Alveolus, Infiltration Cellular, Histiocyte   |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 19 1.2   |  |
| Alveolus, Mineralization                      |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 3.0    |  |
| Nose  | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 50       |  |
| Foreign Body                                  |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 4        |  |
| Fungus  |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1        |  |
| Inflammation                                  |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 2.0    |  |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |                                  |       |       |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------------------------------|-------|-------|
| <b>HARLAN SPRAGUE DAWLEY RATS</b><br><b>MALE</b><br><b>75 mg/kg</b> | DAY ON TEST | 0692  | 0729  | 0637  | 0342  | 0471  | 0769  | 0660  | 0559  | 0337  | 0665  | 0778  | 0778  | 0722  | 0671  | 0664  | 0478  | 0751  | 0773  | 0660  | 0159  | 0595  | 0650  | 0756  | <b>males</b><br><b>(cont...)</b> |       |       |
|   | ANIMAL ID   | 00051 | 00052 | 00053 | 00054 | 00055 | 00056 | 00057 | 00058 | 00059 | 00060 | 00061 | 00062 | 00063 | 00064 | 00065 | 00066 | 00067 | 00068 | 00069 | 00070 | 00071 | 00072 | 00073 |                                  | 00074 | 00075 |
|   |             | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     |                                  | 0     | 0     |

**ALIMENTARY SYSTEM**

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Esophagus<br>Inflammation<br>Epithelium, Hyperplasia   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Cecum<br>Hyperplasia, Lymphoid<br>Necrosis  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Colon   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Rectum  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Duodenum  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Ileum   | A | + | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | A |
| Intestine Small, Jejunum<br>Lymphatic, Ectasia   | A | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | A | + | + | + | + | A | + | + | A |
| Liver<br>Cholangiofibrosis<br>Clear Cell Focus<br>Eosinophilic Focus<br>Mixed Cell Focus<br>Necrosis<br>Artery, Inflammation, Chronic Active<br>Bile Duct, Hyperplasia | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  |   | X |   | X | X |   |   |   |   |   |   | X |   |   |   | X |   |   | X | X |   | X |   |   |   |
|  | X |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|  |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 |   |   |   |   | 2 |   |   |   |   |   |   |
|  |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked





Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg                            | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | males<br>(cont...) |       |       |       |       |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|--------------------|-------|-------|-------|-------|
|   | 0692        | 0729  | 0637  | 0382  | 0441  | 0727  | 0669  | 0660  | 0559  | 0337  | 0665  | 0778  | 0772  | 0778  | 0671  | 0668  | 0445  | 0778  | 0573  | 0660  |                    | 0159  | 0550  | 0619  | 0559  |
| ANIMAL ID   | 00051       | 00052 | 00053 | 00054 | 00055 | 00056 | 00057 | 00058 | 00059 | 00060 | 00061 | 00062 | 00063 | 00064 | 00065 | 00066 | 00067 | 00068 | 00069 | 00070 | 00071              | 00072 | 00073 | 00074 | 00075 |
| Blood Vessel<br>Inflammation, Chronic Active<br>Mineralization            | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +                  | +     | +     | +     | +     |
|   | 2           |       | 3     |       |       | 2     | 2     | 2     | 2     |       | 3     | 1     | 1     | 1     | 1     | 2     | 2     | 2     | 2     | 2     | 3                  | 2     |       | 3     | 2     |
| Heart<br>Cardiomyopathy<br>Atrium, Thrombosis<br>Epicardium, Inflammation | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +                  | +     | +     | +     | +     |
|   |             | 1     | 2     | 3     |       | 3     | 3     | 3     | 3     | 1     | 3     | 2     | 3     | 3     | 3     | 3     | 3     | 3     | 2     | 2     | 3                  | 3     | 2     | 3     | 3     |

**ENDOCRINE SYSTEM**

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Adrenal Cortex<br>Degeneration, Cystic<br>Degeneration, Fatty<br>Hyperplasia<br>Thrombosis | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   | 3 |
|  |   | 2 |   | 1 |   |   | 2 | 2 |   |   | 1 |   |   |   | 2 |   | 2 | 1 |   |   |   |   |   |   |
|  | 1 |   |   |   | 2 |   |   |   |   | 2 |   | 3 |   |   |   |   |   |   |   |   |   |   |   | 3 |
|  |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Adrenal Medulla<br>Degeneration, Fatty<br>Hyperplasia                                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  |   | 4 |   |   |   | 1 | 2 | 3 |   | 3 |   | 2 | 3 |   | 3 | 3 |   |   | 2 | 3 |   | 1 |   |   |
| Islets, Pancreatic<br>Hyperplasia  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |
| Parathyroid Gland<br>Hyperplasia   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | M | M | + | M | M |
|  |   | 1 |   |   |   |   |   |   | 3 |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   | 2 |
| Pituitary Gland<br>Pars Distalis, Hyperplasia  | + | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  | 3 |   | 2 | 2 |   | 2 |   | 4 |   |   |   |   | 4 |   |   |   |   |   |   | 2 | 4 | 3 |   | 2 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | males<br>(cont...) |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|--------------------|
|  | 0692        | 0729  | 0637  | 0382  | 0441  | 0777  | 0666  | 0665  | 0533  | 0666  | 0777  | 0777  | 0777  | 0666  | 0666  | 0444  | 0777  | 0555  | 0777  | 0666  | 0111  | 0555  | 0666  | 0555  | 0666  |                    |
| ANIMAL ID                                      | 00051       | 00052 | 00053 | 00054 | 00055 | 00056 | 00057 | 00058 | 00059 | 00060 | 00061 | 00062 | 00063 | 00064 | 00065 | 00066 | 00067 | 00068 | 00069 | 00070 | 00071 | 00072 | 00073 | 00074 | 00075 |                    |
| Thyroid Gland                                  | +           | +     | +     | A     | +     | +     | +     | A     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     |       |                    |
| C-cell, Hyperplasia                            |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |                    |
| Follicular Cell, Hyperplasia                   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |                    |
| Follicular Cell, Hypertrophy                   | 3           |       | 2     |       |       | 2     | 3     |       |       |       | 2     | 2     | 4     | 3     | 2     | 2     |       |       | 2     | 3     | 1     | 1     | 2     |       | 1 2 1 |                    |

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

|                                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |
|--------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|-----|
| Epididymis                           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   |
| Preputial Gland                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   |
| Prostate                             | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   |
| Atrophy                              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2   |
| Fibrosis                             |   |   |   | 2 |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |     |
| Hyperplasia                          |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |
| Inflammation, Acute                  |   |   |   |   |   |   |   |   |   |   |   | 1 | 3 |   |   |   |   |   |   |   |   |   |   |   |     |
| Seminal Vesicle                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   |
| Testes                               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   |
| Atrophy                              | 1 |   | 1 |   |   | 2 | 2 | 2 | 2 |   | 3 | 1 | 1 | 1 | 3 |   | 1 | 1 | 1 | 2 | 1 | 2 | 3 |   | 3 2 |
| Artery, Inflammation, Chronic Active | 1 |   | 2 |   |   | 3 | 3 | 2 | 3 |   | 3 |   | 1 | 1 |   | 1 | 1 | 1 | 3 |   | 3 | 3 |   |   | 3 1 |

HEMATOPOIETIC SYSTEM

|             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|-------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Bone Marrow | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|-------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | males<br>(cont...) |      |      |      |      |      |      |
|--|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|--------------------|------|------|------|------|------|------|
|  | 0692        | 0729 | 0637 | 0382 | 0441 | 0777 | 0666 | 0555 | 0333 | 0666 | 0555 | 0333 | 0666 | 0777 | 0777 | 0666 | 0444 | 0777 | 0555 | 0777 |                    | 0666 | 0111 | 0555 | 0999 | 0555 | 0666 |
|  | 0000        | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 |                    | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 |
| ANIMAL ID                                      | 51          | 52   | 53   | 54   | 55   | 56   | 57   | 58   | 59   | 60   | 61   | 62   | 63   | 64   | 65   | 66   | 67   | 68   | 69   | 70   | 71                 | 72   | 73   | 74   | 75   | 76   |      |

Hyperplasia

2

Lymph Node

+

+

+

+

Bronchial, Hemorrhage

3

Deep Cervical, Hemorrhage

3

Deep Cervical, Hyperplasia, Plasma Cell

Deep Cervical, Inflammation

4

Mediastinal, Ectasia

Mediastinal, Hemorrhage

3

Mediastinal, Hyperplasia, Lymphoid

Mediastinal, Infiltration Cellular, Histiocyte

3

Pancreatic, Hemorrhage

Renal, Hemorrhage

3

3

Lymph Node, Mandibular

Ectasia

+  
3

Lymph Node, Mesenteric

Ectasia

Hemorrhage

+ +

Spleen

Hematopoietic Cell Proliferation

+  
2 2 3 2 3 3 2 2 1 2 1 2 3 4 4 1 1 3 2 2

Thymus

Atrophy

+ M  
1 1 2 4 2 4 1 3 2 3 3 3 4 4 1 1 3 2

**INTEGUMENTARY SYSTEM**

Mammary Gland

+ +

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

M .. Missing tissue

X .. Lesion present

A .. Autolysis precludes evaluation

1-4 .. Lesion qualified as:

I .. Insufficient tissue

BLANK .. Not examined microscopically

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |                    |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|--------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg | DAY ON TEST | 0692  | 0729  | 0637  | 0382  | 0441  | 0727  | 0669  | 0655  | 0336  | 0667  | 0772  | 0778  | 0772  | 0671  | 0668  | 0445  | 0728  | 0573  | 0760  | 0615  | 0595  | 0050  | 0056  | males<br>(cont...) |
|  | ANIMAL ID   | 00051 | 00052 | 00053 | 00054 | 00055 | 00056 | 00057 | 00058 | 00059 | 00060 | 00061 | 00062 | 00063 | 00064 | 00065 | 00066 | 00067 | 00068 | 00069 | 00070 | 00071 | 00072 | 00073 |                    |

|                           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Skin                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Cyst Epithelial Inclusion |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X |
| Inflammation              |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Necrosis                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

MUSCULOSKELETAL SYSTEM

|                        |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Bone                   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Fibrous Osteodystrophy | 3 | 3 |   |   |   |   |   |   | 3 | 3 |   | 3 | 3 |   |   |   |   | 3 |   |   | 3 | 3 |   | 3 | 3 |

NERVOUS SYSTEM

|              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Brain        | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Gliosis      |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 |   |
| Spinal Cord  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Degeneration |   |   |   | + |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | + |
|              |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |

RESPIRATORY SYSTEM

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Lung  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Foreign Body                                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X |
| Hemorrhage, Multifocal                      |   |   |   | 1 |   |   |   |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |
| Inflammation, Chronic                       | 1 |   | 1 | 1 | 1 |   | 3 |   | 3 |   | 3 |   |   |   | 2 | 3 |   |   | 1 |   |   | 1 |   | 2 | 1 |   |
| Alveolus, Infiltration Cellular, Histiocyte | 1 |   | 1 | 1 |   | 1 |   |   |   |   |   | 1 |   | 1 | 2 |   | 2 |   | 1 | 1 |   |   |   |   |   |   |
| Alveolus, Mineralization                    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 | 3 |   |
| Nose  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Foreign Body                                |   |   |   | X |   |   | X |   |   |   | X |   | X |   |   |   |   |   |   |   |   | X |   | X | X |   |
| Inflammation, Chronic Active                |   |   |   | 1 |   |   | 1 |   | 1 |   | 1 |   | 1 |   |   |   |   |   |   |   |   | 1 |   | 1 | 1 |   |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |                    |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|--------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg | DAY ON TEST | 0692  | 0729  | 0637  | 0344  | 0477  | 0666  | 0655  | 0366  | 0536  | 0366  | 0777  | 0777  | 0666  | 0444  | 0757  | 0577  | 0666  | 0111  | 0555  | 0666  | 0000  | males<br>(cont...) |
|  | ANIMAL ID   | 00051 | 00052 | 00053 | 00054 | 00055 | 00056 | 00057 | 00058 | 00059 | 00060 | 00061 | 00062 | 00063 | 00064 | 00065 | 00066 | 00067 | 00068 | 00069 | 00070 | 00071 |                    |
|  |             | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     |                    |

Thrombosis  
Respiratory Epithelium, Hyperplasia

1

1

1

Trachea  
Inflammation

+ +

2

SPECIAL SENSES SYSTEM

Eye  
Anterior Chamber, Inflammation, Acute  
Cornea, Inflammation, Acute

+  
2 2

Harderian Gland

+ +

Lacrimal Gland  
Degeneration

URINARY SYSTEM

Kidney  
Metaplasia, Osseous  
Nephropathy

+  
3 2 3 3 2 4 4 4 2 4 3 3 2 3 4 3 4 3 3 4 4 3 4 4

Urinary Bladder

+ +

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |       |       |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|-------|-------|
|  | 0637        | 0661  | 0662  | 0663  | 0665  | 0667  | 0667  | 0667  | 0664  | 0666  | 0664  | 0665  | 0666  | 0665  | 0667  | 0664  | 0666  | 0666  | 0665  | 0667  |          | 0666  | 0667  | 0667  |
| ANIMAL ID                                      | 00076       | 00077 | 00078 | 00079 | 00080 | 00081 | 00082 | 00083 | 00084 | 00085 | 00086 | 00087 | 00088 | 00089 | 00090 | 00091 | 00092 | 00093 | 00094 | 00095 | 00096    | 00097 | 00098 | 00099 |

**ALIMENTARY SYSTEM**

|                                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |       |
|--------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|-------|
| Esophagus                            | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Inflammation                         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 2.0 |
| Epithelium, Hyperplasia              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 1.0 |
| Intestine Large, Cecum               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Hyperplasia, Lymphoid                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 3.0 |
| Necrosis                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 4.0 |
| Intestine Large, Colon               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Intestine Large, Rectum              | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Intestine Small, Duodenum            | + | + | A | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 48    |
| Intestine Small, Ileum               | + | + | A | A | + | + | + | + | A | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | 43    |
| Intestine Small, Jejunum             | + | + | A | + | + | + | + | + | A | A | + | A | + | A | + | + | + | + | A | + | + | + | + | + | 39    |
| Lymphatic, Ectasia                   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 1.0 |
| Liver                                | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Cholangiofibrosis                    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 2.0 |
| Clear Cell Focus                     |   |   |   | X |   | X | X |   | X |   |   |   |   |   | X | X |   |   |   |   |   |   | X | X | 13    |
| Eosinophilic Focus                   |   |   |   |   |   | X | X |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   | X | X | 12    |
| Mixed Cell Focus                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X | X |   | 2     |
| Necrosis                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 1.3 |
| Artery, Inflammation, Chronic Active |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 1.0 |
| Bile Duct, Hyperplasia               |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 4 1.0 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Date Report Requested: 04/16/2013

Test Type: CHRONIC

Indole-3-carbinol

Time Report Requested: 09:53:55

Route: GAVAGE

CAS Number: 700-06-1

First Dose M/F: 03/14/07 / 03/15/07

Species/Strain: RATS/HSD

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |        |          |
|--|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|--------|----------|
|  | 0637        | 0661 | 0662 | 0651 | 0672 | 0677 | 0677 | 0677 | 0644 | 0666 | 0644 | 0655 | 0666 | 0655 | 0666 | 0655 | 0677 | 0644 | 0666 | 0666 | 0655 | 0666 | 0677 | 0666 |      | 0677   | 0677     |
|  | 0           | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0      | * TOTALS |
|  | 0007        | 0007 | 0008 | 0009 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000 | 0000   |          |
| Mesentery                                      |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 2      |          |
| Artery, Mineralization                         |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |        | 1 2.0    |
| Oral Mucosa                                    | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 50     |          |
| Foreign Body                                   |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1      |          |
| Hyperplasia, Squamous                          |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 2.0  |          |
| Pancreas                                       | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 50     |          |
| Thrombosis                                     |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 3    |      |      |      |      | 1 3.0  |          |
| Acinus, Atrophy                                |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 1.0  |          |
| Acinus, Hyperplasia                            | 3           |      |      |      |      | 1    |      |      |      |      |      |      |      | 1    |      |      | 2    | 1    |      |      |      | 1    |      |      |      | 10 1.3 |          |
| Artery, Inflammation, Chronic Active           | 2           | 1    |      | 1    | 3    |      | 3    |      | 1    |      | 3    |      | 1    | 1    |      |      |      | 1    | 1    |      | 2    |      | 1    | 1    | 1    | 32 1.8 |          |
| Salivary Glands                                | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 50     |          |
| Metaplasia                                     |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 2.0  |          |
| Stomach, Forestomach                           | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 50     |          |
| Hyperplasia                                    |             |      |      |      | 2    | 1    | 1    |      | 2    | 3    |      | 3    |      |      |      |      | 1    |      | 1    |      |      |      |      | 1    |      | 19 1.7 |          |
| Ulcer  |             |      |      |      |      |      |      |      |      | 3    |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 3.0  |          |
| Stomach, Glandular                             | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | 50     |          |
| Epithelium, Hyperplasia                        |             | 3    |      |      |      | 2    |      |      |      |      | 2    |      |      | 2    |      |      |      | 1    |      |      |      |      |      |      |      | 5 2.0  |          |
| Epithelium, Inflammation                       |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 3.0  |          |
| Epithelium, Inflammation, Chronic Active       |             |      | 2    |      |      |      |      | 3    |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 4 2.0  |          |
| Epithelium, Mineralization                     |             | 3    |      |      |      |      |      |      |      |      | 3    |      | 3    | 4    |      |      | 1    | 3    | 3    |      | 2    |      |      |      |      | 12 2.5 |          |
| Epithelium, Ulcer                              |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 1.0  |          |
| Epithelium, Muscularis, Hyperplasia, Focal     |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | 1 2.0  |          |

CARDIOVASCULAR SYSTEM

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically M .. Missing tissue  
 X .. Lesion present A .. Autolysis precludes evaluation  
 I .. Insufficient tissue BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg   | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |       |       |       |                          |        |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|-------|-------|-------|--------------------------|--------|
|  | 0637        | 0661  | 0662  | 0651  | 0672  | 0677  | 0677  | 0644  | 0666  | 0644  | 0655  | 0666  | 0655  | 0633  | 0666  | 0655  | 0677  | 0644  | 0666  | 0666  |          | 0655  | 0666  | 0677  | 0666  | 0677                     | 0677   |
| ANIMAL ID  | 00076       | 00077 | 00078 | 00079 | 00080 | 00081 | 00082 | 00083 | 00084 | 00085 | 00086 | 00087 | 00088 | 00089 | 00090 | 00091 | 00092 | 00093 | 00094 | 00095 | 00096    | 00097 | 00098 | 00099 | 00100 |                          |        |
| Blood Vessel<br>Inflammation, Chronic Active<br>Mineralization                             | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +     | 50                       |        |
|  | 2           | 2     | 2     | 2     | 2     | 3     | 3     | 2     | 3     |       | 2     |       | 1     | 2     |       |       |       |       | 2     | 2     |          | 3     | 2     |       | 2     | 2                        |        |
|  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 3     |       |          |       |       |       |       | 38 2.1<br>2 3.0          |        |
| Heart<br>Cardiomyopathy<br>Atrium, Thrombosis<br>Epicardium, Inflammation                  | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +     | 50                       |        |
|  | 3           | 3     | 3     | 3     | 2     | 3     | 3     | 3     | 3     | 2     | 3     | 3     | 3     | 3     | 1     | 1     | 2     | 3     | 3     | 3     | 3        | 2     | 2     | 3     | 1     | 48 2.6<br>3 3.3<br>1 3.0 |        |
|  | 3           |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 3     |       |       |       |       |          |       |       |       |       | 1 3.0                    |        |
| <b>ENDOCRINE SYSTEM</b>  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |       |                          |        |
| Adrenal Cortex<br>Degeneration, Cystic<br>Degeneration, Fatty<br>Hyperplasia<br>Thrombosis | M           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +     | 49                       |        |
|  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |       | 3                        |        |
|  |             |       |       |       |       |       |       |       |       | 1     |       | 2     |       | 2     | 2     |       |       |       |       |       |          |       |       | 3     |       | 13 1.8                   |        |
|  |             |       | 2     | 3     | 2     |       | 3     | 2     | 2     |       |       | 2     | 2     |       | 1     | 1     | 2     | 2     |       |       | 3        | 2     |       |       |       | 19 2.1                   |        |
|  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |       | 1 2.0                    |        |
| Adrenal Medulla<br>Degeneration, Fatty<br>Hyperplasia                                      | M           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +     | 49                       |        |
|  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |       | 1 1.0                    |        |
|  |             |       | 2     | 3     |       | 2     | 1     | 1     |       | 1     |       |       | 1     | 4     |       | 1     |       | 1     | 2     |       |          |       |       |       |       | 22 2.2                   |        |
| Islets, Pancreatic<br>Hyperplasia  | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +     | 50                       |        |
|  |             |       | 3     |       | 2     |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |       | 6 2.0                    |        |
| Parathyroid Gland<br>Hyperplasia   | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +     | 46                       |        |
|  |             |       | 2     |       |       |       |       |       | 1     |       |       |       | 3     | 2     |       |       |       |       | 3     |       |          | 3     |       |       |       | 10 2.2                   |        |
| Pituitary Gland<br>Pars Distalis, Hyperplasia  | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +     | 49                       |        |
|  |             |       | 2     |       |       | 3     |       |       |       |       |       | 1     |       |       |       | 1     |       |       |       |       | 3        |       | 3     |       | 4     | 2                        | 18 2.6 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|
|  | 0637        | 0617  | 0623  | 0516  | 0577  | 0577  | 0577  | 0464  | 0664  | 0446  | 0546  | 0566  | 0556  | 0536  | 0566  | 0556  | 0351  | 0577  | 0488  | 0666  | 0667  | 0558  | 0667  | 0767  |          | 0677  |
| ANIMAL ID                                      | 00076       | 00077 | 00078 | 00079 | 00080 | 00081 | 00082 | 00083 | 00084 | 00085 | 00086 | 00087 | 00088 | 00089 | 00090 | 00091 | 00092 | 00093 | 00094 | 00095 | 00096 | 00097 | 00098 | 00099 | 00100    | 00101 |
| Thyroid Gland                                  | +           |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 46       |       |
| C-cell, Hyperplasia                            | 2           |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 4        | 2.0   |
| Follicular Cell, Hyperplasia                   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1        | 4.0   |
| Follicular Cell, Hypertrophy                   | 3 2 1 1 1 2 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 34       | 1.9   |

**GENERAL BODY SYSTEM**

NONE

**GENITAL SYSTEM**

|                                      |                                   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |     |
|--------------------------------------|-----------------------------------|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----|-----|
| Epididymis                           | +                                 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |     |
| Preputial Gland                      | +                                 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |     |
| Prostate                             | +                                 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |     |
| Atrophy                              |                                   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1  | 2.0 |
| Fibrosis                             |                                   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 3  | 1.7 |
| Hyperplasia                          | 3                                 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 4  | 2.3 |
| Inflammation, Acute                  | 1 1 2 1                           |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 6  | 1.5 |
| Seminal Vesicle                      | +                                 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |     |
| Testes                               | +                                 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |     |
| Atrophy                              | 2 2 1 1 2 2 2 3 3                 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 37 | 2.0 |
| Artery, Inflammation, Chronic Active | 2 3 2 2 3 3 4 3 2 2 1 2 2 1 1 3 2 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 34 | 2.1 |

**HEMATOPOIETIC SYSTEM**

|             |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |
|-------------|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----|
| Bone Marrow | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |
|-------------|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg | DAY ON TEST                                   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |
|--|---|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|
|  | 0637  | 0661  | 0662  | 0651  | 0672  | 0677  | 0677  | 0644  | 0666  | 0644  | 0655  | 0666  | 0655  | 0666  | 0655  | 0677  | 0644  | 0666  | 0666  | 0655  | 0666  | 0677  | 0666  | 0677  |          |
| ANIMAL ID                                      | 00076   | 00077 | 00078 | 00079 | 00080 | 00081 | 00082 | 00083 | 00084 | 00085 | 00086 | 00087 | 00088 | 00089 | 00090 | 00091 | 00092 | 00093 | 00094 | 00095 | 00096 | 00097 | 00098 | 00099 | 00100    |
| Hyperplasia                                    | 2   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 2     | 2.0      |
| Lymph Node                                     | +   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 8     |          |
| Bronchial, Hemorrhage                          |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1     | 3.0      |
| Deep Cervical, Hemorrhage                      |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 3     | 3.0      |
| Deep Cervical, Hyperplasia, Plasma Cell        |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 3.0      |
| Deep Cervical, Inflammation                    |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 4.0      |
| Mediastinal, Ectasia                           | 3   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1     | 3.0      |
| Mediastinal, Hemorrhage                        |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 2     | 2.5      |
| Mediastinal, Hyperplasia, Lymphoid             |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 4     | 4.0      |
| Mediastinal, Infiltration Cellular, Histiocyte |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1     | 3.0      |
| Pancreatic, Hemorrhage                         | 2   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1     | 2.0      |
| Renal, Hemorrhage                              |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 2     | 3.0      |
| Lymph Node, Mandibular                         | +   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 50    |          |
| Ectasia  |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1     | 3.0      |
| Lymph Node, Mesenteric                         | +   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 50    |          |
| Ectasia  |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 3     | 3.0      |
| Hemorrhage                                     |   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1     | 1.0      |
| Spleen   | +   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 50    |          |
| Hematopoietic Cell Proliferation               | 3 2 2 2 2 2 2 2 3 2 3 2 3 3 4 1 3 1 4 1       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 33    | 2.2      |
| Thymus   | +   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 49    |          |
| Atrophy  | 3 4 2 1 2 2 2 3 4 3 3 4 4 2 3 3 3 4 1 3 1 4 1 |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 41    | 2.6      |

**INTEGUMENTARY SYSTEM**

|               |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |  |
|---------------|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----|--|
| Mammary Gland | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |  |
|---------------|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----|--|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |       |       |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|-------|-------|
|  | 0637        | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  | 0667  |          | 0667  |       |       |
| ANIMAL ID                                      | 00076       | 00077 | 00078 | 00079 | 00080 | 00081 | 00082 | 00083 | 00084 | 00085 | 00086 | 00087 | 00088 | 00089 | 00090 | 00091 | 00092 | 00093 | 00094 | 00095 | 00096    | 00097 | 00098 | 00099 |

|                           |   |  |  |  |  |  |  |  |  |   |  |   |  |  |  |  |  |  |  |  |  |  |   |    |     |
|---------------------------|---|--|--|--|--|--|--|--|--|---|--|---|--|--|--|--|--|--|--|--|--|--|---|----|-----|
| Skin                      | + |  |  |  |  |  |  |  |  |   |  |   |  |  |  |  |  |  |  |  |  |  |   | 50 |     |
| Cyst Epithelial Inclusion |   |  |  |  |  |  |  |  |  | X |  |   |  |  |  |  |  |  |  |  |  |  | X | 3  |     |
| Inflammation              |   |  |  |  |  |  |  |  |  |   |  | 3 |  |  |  |  |  |  |  |  |  |  |   | 2  | 3.0 |
| Necrosis                  | 4 |  |  |  |  |  |  |  |  |   |  | 3 |  |  |  |  |  |  |  |  |  |  |   | 2  | 3.5 |

**MUSCULOSKELETAL SYSTEM**

|                        |   |  |  |   |   |  |  |  |  |   |  |   |  |   |  |  |  |   |   |  |   |  |  |    |     |
|------------------------|---|--|--|---|---|--|--|--|--|---|--|---|--|---|--|--|--|---|---|--|---|--|--|----|-----|
| Bone                   | + |  |  |   |   |  |  |  |  |   |  |   |  |   |  |  |  |   |   |  |   |  |  | 50 |     |
| Fibrous Osteodystrophy |   |  |  | 3 | 3 |  |  |  |  | 3 |  | 3 |  | 3 |  |  |  | 3 | 3 |  | 3 |  |  | 19 | 3.0 |

**NERVOUS SYSTEM**

|              |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |     |
|--------------|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----|-----|
| Brain        | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |     |
| Gliosis      |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 2  | 1.0 |
| Spinal Cord  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 2  |     |
| Degeneration |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 2  | 2.5 |

**RESPIRATORY SYSTEM**

|   |   |   |   |   |   |   |   |  |   |  |  |  |  |   |  |  |  |  |  |  |   |   |   |    |     |     |   |    |     |
|---|---|---|---|---|---|---|---|--|---|--|--|--|--|---|--|--|--|--|--|--|---|---|---|----|-----|-----|---|----|-----|
| Lung  | + |   |   |   |   |   |   |  |   |  |  |  |  |   |  |  |  |  |  |  |   |   |   | 50 |     |     |   |    |     |
| Foreign Body                                |   |   |   |   |   |   |   |  |   |  |  |  |  |   |  |  |  |  |  |  |   |   |   | 1  |     |     |   |    |     |
| Hemorrhage, Multifocal                      | 1 |   |   |   |   |   |   |  |   |  |  |  |  |   |  |  |  |  |  |  |   |   |   | 3  | 1.0 |     |   |    |     |
| Inflammation, Chronic                       | 3 | 2 |   |   |   |   |   |  |   |  |  |  |  |   |  |  |  |  |  |  |   | 1 | 2 | 2  | 3   | 2   | 1 | 21 | 1.9 |
| Alveolus, Infiltration Cellular, Histiocyte |   | 2 | 1 | 1 | 1 | 1 | 1 |  | 1 |  |  |  |  | 1 |  |  |  |  |  |  | 1 | 1 | 1 | 1  | 22  | 1.1 |   |    |     |
| Alveolus, Mineralization                    |   |   |   |   |   |   |   |  |   |  |  |  |  |   |  |  |  |  |  |  |   |   |   | 2  | 2.5 |     |   |    |     |
| Nose  | + |   |   |   |   |   |   |  |   |  |  |  |  |   |  |  |  |  |  |  |   |   |   | 50 |     |     |   |    |     |
| Foreign Body                                |   |   |   |   |   |   |   |  |   |  |  |  |  |   |  |  |  |  |  |  |   |   |   | 12 |     |     |   |    |     |
| Inflammation, Chronic Active                |   |   |   |   |   |   |   |  |   |  |  |  |  |   |  |  |  |  |  |  |   |   |   | 15 | 1.3 |     |   |    |     |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue

M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>75 mg/kg | DAY ON TEST | 0637  | 0617  | 0623  | 0651  | 0677  | 0677  | 0677  | 0644  | 0666  | 0644  | 0655  | 0666  | 0655  | 0666  | 0655  | 0677  | 0644  | 0666  | 0666  | 0655  | 0666  | 0677  | 0666  | 0677  | 0677  | 0677  | * TOTALS |
|  | ANIMAL ID   | 00076 | 00077 | 00078 | 00079 | 00080 | 00081 | 00082 | 00083 | 00084 | 00085 | 00086 | 00087 | 00088 | 00089 | 00090 | 00091 | 00092 | 00093 | 00094 | 00095 | 00096 | 00097 | 00098 | 00099 | 00100 | 00101 |          |
|  |             | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     |          |

|                                     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |   |     |     |
|-------------------------------------|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|---|-----|-----|
| Thrombosis                          |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 | 1.0 |     |
| Respiratory Epithelium, Hyperplasia |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |   | 2   | 1.0 |

|                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |       |
|----------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-------|
| Trachea Inflammation | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 1 2.0 |
|----------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-------|

SPECIAL SENSES SYSTEM

|                                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |
|---------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|
| Eye                                   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |
| Anterior Chamber, Inflammation, Acute |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 3.0 |
| Cornea, Inflammation, Acute           | 2 | 3 |   |   | 2 |   |   |   |   | 1 |   |   | 3 |   | 2 | 3 |   |   |   | 3 | 2 |   |   |   | 2 | 2 |   |   |   | 25 | 2.1 |

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |  |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|--|
| Harderian Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |  |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|--|

|                             |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |   |   |       |
|-----------------------------|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|---|---|-------|
| Lacrimal Gland Degeneration |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 2 |   |       |
|                             |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |   | 3 | 2 3.0 |

URINARY SYSTEM

|                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |     |
|---------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|-----|
| Kidney              | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |
| Metaplasia, Osseous |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1   | 2.0 |
| Nephropathy         | 4 | 4 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 4 | 4 | 4 | 4 | 3 | 3 | 3 | 4 | 4 | 3 | 4 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 49 | 3.3 |     |

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |  |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|--|
| Urinary Bladder | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |  |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|--|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |                    |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|--------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST | 0693 | 0728 | 0587 | 0779 | 0520 | 0657 | 0594 | 0553 | 0664 | 0593 | 0724 | 0773 | 0777 | 0486 | 0729 | 0779 | 0779 | 0676 | 0722 | 0423 | 0727 | 0367 | 0570 | 0706 | males<br>(cont...) |
|   | ANIMAL ID   | 0010 | 0011 | 0012 | 0013 | 0014 | 0015 | 0016 | 0017 | 0018 | 0019 | 0020 | 0021 | 0022 | 0023 | 0024 | 0025 | 0026 | 0027 | 0028 | 0029 | 0030 | 0031 | 0032 | 0033 |                    |

ALIMENTARY SYSTEM

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Esophagus                                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Cecum                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Colon                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Rectum                         | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Duodenum<br>Lymphatic, Ectasia | + | + | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Ileum                          | + | + | + | + | + | + | + | A | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Jejunum<br>Lymphatic, Ectasia  | + | + | A | A | + | + | + | + | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | A |
| Liver   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Basophilic Focus                                |   |   |   |   |   |   |   | X |   |   |   |   |   | X |   | X |   |   |   |   |   |   |   |   |   |
| Cholangiofibrosis                               |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   | 4 |   |   |   |   |   |   |   |   |   |   |
| Clear Cell Focus                                |   | X |   |   | X |   |   |   | X | X | X | X |   | X | X |   | X |   | X |   | X |   |   |   |   |
| Degeneration, Cystic                            |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |
| Eosinophilic Focus                              |   |   |   |   | X |   | X |   |   |   |   |   | X |   |   |   | X |   | X |   |   |   |   |   |   |
| Hepatodiaphragmatic Nodule                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Mixed Cell Focus                                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Necrosis  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Bile Duct, Cyst                                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 | 2 |
| Bile Duct, Cyst, Multiple                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Bile Duct, Fibrosis                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg   | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | males<br>(cont...) |      |      |      |      |  |  |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|--------------------|------|------|------|------|--|--|
|   | 0693        | 0728 | 0757 | 0777 | 0755 | 0656 | 0555 | 0566 | 0556 | 0677 | 0777 | 0777 | 0474 | 0777 | 0777 | 0777 | 0777 | 0676 | 0777 | 0474 |                    | 0777 | 0373 | 0575 | 0777 |  |  |
| ANIMAL ID   | 0011        | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011               | 0011 | 0011 | 0011 |      |  |  |
| Bile Duct, Hyperplasia  | 2           |      |      |      |      |      |      |      |      |      | 1    |      |      |      |      |      |      |      |      |      |                    |      |      |      |      |  |  |
| Mesentery   | +           |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |                    |      |      |      |      |  |  |
| Oral Mucosa<br>Hyperplasia, Squamous  | +           |      |      | +    |      |      | +    |      |      | +    |      |      | +    |      |      | +    |      |      | +    |      |                    | +    |      |      | +    |  |  |
| Pancreas<br>Acinus, Hyperplasia<br>Artery, Inflammation, Chronic Active   | +           |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +                  |      | +    |      |      |  |  |
| Salivary Glands   | +           |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |                    |      |      |      |      |  |  |
| Stomach, Forestomach<br>Erosion<br>Hyperplasia<br>Inflammation<br>Ulcer   | +           |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +                  |      | +    |      |      |  |  |
| Stomach, Glandular<br>Epithelium, Amyloid Deposition<br>Epithelium, Hyperplasia<br>Epithelium, Inflammation, Chronic Active<br>Epithelium, Mineralization | +           |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +    |      | +                  |      | +    |      |      |  |  |
| Tooth<br>Malformation   |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | +                  |      |      |      |      |  |  |

CARDIOVASCULAR SYSTEM

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | males<br>(cont...) |      |      |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|--------------------|------|------|
|   | 0693        | 0728 | 0587 | 0779 | 0777 | 0556 | 0657 | 0559 | 0550 | 0664 | 0553 | 0664 | 0773 | 0777 | 0777 | 0448 | 0779 | 0777 | 0779 | 0777 | 0667 | 0776 | 0447 | 0773 |                    | 0557 | 0770 |
| ANIMAL ID                                       | 0010        | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011               | 0011 | 0011 |

|                              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Blood Vessel                 | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Inflammation, Chronic Active |   |   |   | 2 | 2 |   | 3 | 2 | 1 | 3 | 4 | 3 | 2 |   | 2 |   | 2 | 3 | 3 | 2 |   | 2 |   |   | + | + |
| Mineralization               |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Thrombosis                   |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Heart                        | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Cardiomyopathy               | 3 | 3 | 3 | 3 | 2 | 1 | 3 | 3 | 2 | 3 | 3 | 3 | 2 | 2 | 1 | 1 | 3 | 2 | 3 | 2 |   | 2 | 1 | 2 | 3 |   |
| Atrium, Thrombosis           |   |   |   |   |   |   |   |   |   | 3 | 4 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Pericardium, Inflammation    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |

ENDOCRINE SYSTEM

|                                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |  |  |  |  |  |   |   |
|----------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|--|--|--|--|--|--|---|---|
| Adrenal Cortex                   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |   |  |  |  |  |  |  |   |   |
| Degeneration, Cystic             |   |   | 2 |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |  |  |  |  |  |  |   |   |
| Degeneration, Fatty              |   |   |   |   |   |   |   |   |   | 1 |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |  |  |  |  |  |  |   |   |
| Hematopoietic Cell Proliferation |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |  |  |  |  |  |  |   |   |
| Hemorrhage                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |  |  |  |  |  |  |   |   |
| Hyperplasia                      | 3 | 2 | 1 |   |   | 2 | 4 |   |   |   |   |   | 2 |   |   |   |   |   |   |   | 2 |   |   |   | 1 |   |   |   |  |  |  |  |  |  |   |   |
| Adrenal Medulla                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |   |   |  |  |  |  |  |  |   |   |
| Hyperplasia                      |   |   |   | 2 |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 | 2 | 3 |  |  |  |  |  |  |   |   |
| Islets, Pancreatic               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |   |  |  |  |  |  |  |   |   |
| Hyperplasia                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |  |  |  |  |  |  |   |   |
| Parathyroid Gland                | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |   |  |  |  |  |  |  |   |   |
| Hyperplasia                      | 1 |   | 3 |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 | 2 |   |  |  |  |  |  |  | 2 | 2 |
| Pituitary Gland                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |   |  |  |  |  |  |  |   |   |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | males<br>(cont...) |      |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|--------------------|------|
|   | 0693        | 0728 | 0577 | 0779 | 0779 | 0556 | 0659 | 0590 | 0556 | 0663 | 0564 | 0773 | 0777 | 0777 | 0474 | 0779 | 0777 | 0779 | 0779 | 0676 | 0772 | 0423 | 0772 | 0367 | 0570 |                    | 0770 |
| ANIMAL ID                                       | 0010        | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011               | 0011 |
| Pars Distalis, Hyperplasia                      |             |      |      |      |      | 3    | 4    |      |      |      |      |      |      | 1    | 4    |      |      | 1    | 2    | 2    | 1    |      |      |      |      |                    |      |
| Thyroid Gland                                   | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +                  | +    |
| C-cell, Hyperplasia                             |             | 4    |      |      |      |      |      |      |      |      |      |      |      | 2    |      |      |      |      |      |      |      | 2    |      |      |      |                    |      |
| Follicular Cell, Hypertrophy                    |             | 1    |      | 2    | 2    |      |      |      |      | 2    |      |      | 2    | 1    | 3    | 3    | 2    |      | 3    |      | 1    | 2    | 2    |      | 1    | 4                  |      |

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Epididymis  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Preputial Gland Cyst  | + | + | + | + | + | 3 | 3 |   |   | 4 |   |   |   |   |   |   | M | + | + | + | + | + | + | + | + | + | + |
| Prostate Fibrosis Hyperplasia   | + | + | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |
| Seminal Vesicle Hypoplasia  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 2 |
| Testes Atrophy  | + | 3 | 1 | 3 | 1 |   | 3 | 1 |   |   |   | 2 | 3 |   |   | 1 |   |   | 3 | 2 | 2 |   | 1 |   |   |   | 2 |
| Pigmentation, Hemosiderin Artery, Inflammation, Chronic Active Interstitial Cell, Hyperplasia |   |   |   | 1 | 4 | 3 |   | 4 | 1 |   | 2 | 2 | 3 |   | 2 |   | 2 | 3 |   | 2 |   | 2 |   |   |   |   | 2 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |                    |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|--------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST | 0693 | 0728 | 0587 | 0779 | 0520 | 0655 | 0590 | 0564 | 0553 | 0664 | 0723 | 0777 | 0488 | 0722 | 0779 | 0779 | 0676 | 0742 | 0773 | 0535 | 0757 | 0006 | males<br>(cont...) |
|   | ANIMAL ID   | 0010 | 0011 | 0012 | 0013 | 0014 | 0015 | 0016 | 0017 | 0018 | 0019 | 0020 | 0021 | 0022 | 0023 | 0024 | 0025 | 0026 | 0027 | 0028 | 0029 | 0030 | 0031 |                    |

HEMATOPOIETIC SYSTEM

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Bone Marrow<br>Hyperplasia                   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
|  | 3 |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Lymph Node<br>Bronchial, Hemorrhage          |   |   |   |   |   |   |   |   |   |   |   | + |   |   | + |   |   |   |   |   |   |   |   | + |   |
| Iliac, Infiltration Cellular, Histiocyte     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Lumbar, Hemorrhage                           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |
| Mediastinal, Ectasia                         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Mediastinal, Hemorrhage                      |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   | 3 |   |   |   |   |   |   |   |   |   |   |
| Lymph Node, Mandibular<br>Ectasia            | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Hemorrhage                                   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |
| Lymph Node, Mesenteric<br>Lymphatic, Ectasia | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |
| Spleen<br>Hematopoietic Cell Proliferation   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Necrosis                                     | 3 | 2 |   | 1 | 1 | 2 | 2 |   | 2 |   | 3 | 1 | 1 | 1 | 2 | 2 |   | 2 |   |   | 3 | 3 |   | 1 |   |
| Thymus<br>Atrophy                            | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Hemorrhage                                   | 3 | 1 | 4 | 1 |   | 2 | 4 | 3 |   | 2 | 4 | 2 | 2 | 3 | 3 | 3 | 4 |   | 4 | 2 | 1 | 1 | 3 | 2 | 3 |
|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |

INTEGUMENTARY SYSTEM

|               |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Mammary Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|---------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |            |            |            |            |            |            |            |            |            |            |            |            |            |            |            |            |            |            |            |            |            |            |      |                    |
|---|-------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------|--------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST | 0693       | 0728       | 0587       | 0779       | 0777       | 0556       | 0659       | 0590       | 0562       | 0673       | 0772       | 0772       | 0488       | 0722       | 0720       | 0770       | 0676       | 0722       | 0423       | 0777       | 0367       | 0570       | 0706 | males<br>(cont...) |
|   | ANIMAL ID   | 0010       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011       | 0011 |                    |
|   |             | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 | 1234567890 |      |                    |

|                           |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|---------------------------|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|
| Fibrosis                  | 2 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Skin                      | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Cyst Epithelial Inclusion | X |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

MUSCULOSKELETAL SYSTEM

|                        |         |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|------------------------|---------|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|
| Bone                   | +       |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Fibrous Osteodystrophy | 3 3 3 3 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Maxilla, Fracture      | 2       |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

NERVOUS SYSTEM

|                          |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|--------------------------|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|
| Brain                    | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Spinal Cord Degeneration |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

RESPIRATORY SYSTEM

|   |                           |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|---|---------------------------|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|
| Lung  | +                         |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Edema                                       |                           |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Foreign Body                                |                           |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Hemorrhage                                  | 1                         |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Hemorrhage, Multifocal                      | 2 2 1 1 2                 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Inflammation, Granulomatous                 |                           |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Inflammation, Chronic                       | 2 2 3 1 2 3 1 1           |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Alveolar Epithelium, Hyperplasia            | 1                         |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Alveolus, Infiltration Cellular, Histiocyte | 1 1 1 1 1 1 1 3 2 2 1 1 1 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Alveolus, Mineralization                    |                           |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|  |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
|--|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|
| <b>HARLAN SPRAGUE DAWLEY RATS</b><br><b>MALE</b><br><b>150 mg/kg</b> | DAY ON TEST | 0693 | 0728 | 0587 | 0770 | 0772 | 0556 | 0559 | 0650 | 0553 | 0664 | 0554 | 0773 | 0777 | 0474 | 0772 | 0772 | 0770 | 0777 | 0661 | 0772 | 0423 | 0772 | 0367 | 0570 | 0770 |      |
|  | ANIMAL ID   | 0010 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 |
|  |             | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    | 1    | 2    | 2    | 2    | 3    | 4    |

males  
(cont...)

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Nose   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Foreign Body                                 |   |   |   |   |   |   |   |   |   | X |   | X |   |   |   |   |   |   |   |   |   | X |   | X |   |   |
| Inflammation, Chronic Active                 |   | 1 | 2 |   |   |   |   |   |   | 2 |   | 1 |   |   |   |   | 1 |   |   |   |   | 3 |   | 3 |   | 1 |
| Respiratory Epithelium, Hyperplasia          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Respiratory Epithelium, Metaplasia, Squamous |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Trachea                                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Inflammation                                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

SPECIAL SENSES SYSTEM

|                                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |
|---------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|-----|
| Ear                                   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |
| External Ear, Hyperplasia, Squamous   |   |   |   |   |   | + |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |
|                                       |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |
| Eye                                   | + | + | + | + | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   |
| Anterior Chamber, Inflammation, Acute |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |
| Cornea, Inflammation, Acute           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |
|                                       | 2 |   | 3 |   |   |   |   |   |   |   | 2 | 3 | 2 |   |   | 2 |   |   |   |   |   | 2 | 3 |   |   | 3 3 |
| Harderian Gland                       | + | + | + | + | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   |
| Lacrimal Gland                        |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |
| Degeneration                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |
|                                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |

URINARY SYSTEM

|                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Kidney                   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Nephropathy              | 3 | 3 | 4 | 4 | 3 | 3 | 3 | 4 | 3 | 4 | 4 | 3 | 3 | 3 | 3 | 3 | 3 | 4 | 4 | 4 | 3 | 1 | 3 |   | 3 | 4 |
| Renal Tubule, Dilatation |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Urinary Bladder          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | * TOTALS |
|---|-------------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|
|   | 07<br>29    | 07<br>29 | 04<br>82 | 05<br>93 | 07<br>28 | 05<br>58 | 05<br>83 | 06<br>23 | 04<br>99 | 07<br>29 | 06<br>99 | 06<br>04 | 04<br>86 | 05<br>46 | 06<br>97 | 05<br>49 | 07<br>27 | 07<br>71 | 07<br>31 | 05<br>66 | 06<br>12 | 06<br>11 | 07<br>27 | 07<br>77 |          |
| ANIMAL ID                                       | 00126       | 00127    | 00128    | 00129    | 00130    | 00131    | 00132    | 00133    | 00134    | 00135    | 00136    | 00137    | 00138    | 00139    | 00140    | 00141    | 00142    | 00143    | 00144    | 00145    | 00146    | 00147    | 00148    | 00149    | 00150    |

**ALIMENTARY SYSTEM**

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |              |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|--------------|
| Esophagus                                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50           |
| Intestine Large, Cecum                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50           |
| Intestine Large, Colon                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50           |
| Intestine Large, Rectum                         | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50           |
| Intestine Small, Duodenum<br>Lymphatic, Ectasia | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | A | + | + | + | + | + | 47<br>15 1.5 |
| Intestine Small, Ileum                          | + | + | + | + | + | A | + | A | + | + | A | A | + | + | + | + | + | + | + | A | + | A | + | + | + | 42           |
| Intestine Small, Jejunum<br>Lymphatic, Ectasia  | + | + | + | + | + | A | + | A | + | + | A | + | + | + | A | + | + | + | + | A | + | A | + | + | + | 40<br>27 1.7 |
| Liver   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50           |
| Basophilic Focus                                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3            |
| Cholangiofibrosis                               |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 2.7        |
| Clear Cell Focus                                | X | X |   |   | X |   |   |   |   | X | X |   |   |   |   |   |   |   | X |   |   |   |   | X |   | 18           |
| Degeneration, Cystic                            |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 3.0        |
| Eosinophilic Focus                              |   |   | X |   | X |   |   |   |   |   |   |   |   |   |   |   |   | X | X |   |   |   | X |   |   | 10           |
| Hepatodiaphragmatic Nodule                      |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1            |
| Mixed Cell Focus                                |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1            |
| Necrosis  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 5 2.0        |
| Bile Duct, Cyst                                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 2.0        |
| Bile Duct, Cyst, Multiple                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 2.0        |
| Bile Duct, Fibrosis                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 3.0        |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg      | DAY ON TEST |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | * TOTALS |          |          |          |        |       |
|--|-------------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|--------|-------|
|  | 07<br>29    | 07<br>29 | 04<br>82 | 05<br>93 | 07<br>28 | 05<br>58 | 05<br>83 | 06<br>23 | 04<br>99 | 07<br>29 | 06<br>99 | 06<br>04 | 04<br>86 | 05<br>46 | 06<br>97 | 05<br>49 | 07<br>27 | 07<br>71 | 05<br>31 | 06<br>66 |          | 07<br>12 | 06<br>11 | 07<br>27 |        |       |
| ANIMAL ID  | 001126      | 001127   | 001128   | 001129   | 001130   | 001131   | 001132   | 001133   | 001134   | 001135   | 001136   | 001137   | 001138   | 001139   | 001140   | 001141   | 001142   | 001143   | 001144   | 001145   | 001146   | 001147   | 001148   | 001149   |        |       |
| Bile Duct, Hyperplasia                               |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 2      | 3 1.7 |
| Mesentery  |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 1      |       |
| Oral Mucosa<br>Hyperplasia, Squamous                 | +           | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | 50       | 2 2.5  |       |
| Pancreas<br>Acinus, Hyperplasia                      | 3           |          |          | 1        |          |          |          |          |          |          |          |          |          | 1        |          |          |          |          |          |          |          |          |          | 50       | 14 1.8 |       |
| Artery, Inflammation, Chronic Active                 | 2           | 3        |          |          |          | 1        |          | 3        | 1        | 3        | 2        | 2        |          | 1        | 2        | 1        |          | 2        |          | 2        |          | 1        | 2        | 50       | 27 1.9 |       |
| Salivary Glands                                      | +           | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | M        | +        | +        | +        | +        | +        | +        | +        | +        | +        | 49       |        |       |
| Stomach, Forestomach<br>Erosion                      | +           | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | 50       | 1 1.0  |       |
| Hyperplasia  |             |          | 2        |          |          |          |          |          |          |          |          | 2        | 3        |          | 2        |          | 2        | 2        |          | 2        | 3        |          | 3        | 50       | 19 2.3 |       |
| Inflammation   |             |          |          |          |          | 2        |          |          |          |          |          |          |          |          | 1        |          |          |          |          |          |          |          |          | 50       | 4 1.3  |       |
| Ulcer  |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 50       | 1 3.0  |       |
| Stomach, Glandular<br>Epithelium, Amyloid Deposition | +           | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | +        | 50       | 1 3.0  |       |
| Epithelium, Hyperplasia                              |             |          |          |          | 2        |          |          |          |          | 1        | 2        |          |          |          | 2        |          | 3        |          |          |          |          |          |          | 50       | 7 2.0  |       |
| Epithelium, Inflammation, Chronic Active             |             |          |          |          |          |          |          |          |          | 2        |          |          |          |          |          |          |          |          |          |          |          |          |          | 50       | 2 1.5  |       |
| Epithelium, Mineralization                           |             |          |          |          | 3        |          |          |          |          | 2        |          |          |          |          | 3        |          |          |          |          |          |          |          |          | 50       | 6 2.3  |       |
| Tooth<br>Malformation                                |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 1        | 1 3.0  |       |

CARDIOVASCULAR SYSTEM

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | * TOTALS |          |          |          |          |          |    |     |     |
|---|-------------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----|-----|-----|
|   | 07<br>29    | 07<br>29 | 04<br>82 | 05<br>93 | 07<br>28 | 05<br>58 | 05<br>83 | 06<br>63 | 04<br>92 | 07<br>29 | 06<br>69 | 06<br>64 | 04<br>86 | 05<br>54 | 06<br>69 | 05<br>49 | 07<br>27 | 07<br>71 | 07<br>72 | 05<br>31 |          | 06<br>66 | 07<br>12 | 06<br>11 | 07<br>27 | 07<br>27 |    |     |     |
| ANIMAL ID                                       | 00116       | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    | 00011    |    |     |     |
| Blood Vessel                                    |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | 50 |     |     |
| Inflammation, Chronic Active                    | 2           | 2        |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 30  | 2.3 |
| Mineralization                                  |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 1   | 3.0 |
| Thrombosis                                      |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 1   |     |
| Heart   |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 50  |     |
| Cardiomyopathy                                  | 3           | 2        | 1        | 3        | 1        | 3        | 3        | 3        | 3        | 2        | 3        | 3        | 2        | 3        | 3        | 2        | 3        | 2        | 2        | 3        | 3        | 3        | 3        | 3        | 3        | 3        |    | 49  | 2.5 |
| Atrium, Thrombosis                              |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 3   | 3.3 |
| Pericardium, Inflammation                       |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 1   | 3.0 |
| <b>ENDOCRINE SYSTEM</b>                         |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    |     |     |
| Adrenal Cortex                                  |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 50  |     |
| Degeneration, Cystic                            |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 5   | 1.8 |
| Degeneration, Fatty                             |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 5   | 1.6 |
| Hematopoietic Cell Proliferation                |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 1   | 2.0 |
| Hemorrhage                                      |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 1   | 3.0 |
| Hyperplasia                                     | 1           |          |          |          | 4        |          |          |          |          |          | 2        |          |          | 1        |          | 2        |          | 2        |          | 2        | 1        |          | 3        | 1        |          | 3        | 19 | 2.1 |     |
| Adrenal Medulla                                 |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 50  |     |
| Hyperplasia                                     |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 20  | 1.9 |
| Islets, Pancreatic                              |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 50  |     |
| Hyperplasia                                     |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 1   | 2.0 |
| Parathyroid Gland                               |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 50  |     |
| Hyperplasia                                     |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 13  | 2.0 |
| Pituitary Gland                                 |             |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | 50  |     |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | * TOTALS |     |     |
|---|-------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----------|-----|-----|
|   | 0           | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |   |          |     |     |
|   | 7           | 7 | 4 | 5 | 7 | 5 | 5 | 6 | 4 | 7 | 6 | 6 | 4 | 5 | 6 | 5 | 7 | 7 | 7 | 5 | 6 | 7 | 6 | 7 |          | 7   |     |
|   | 2           | 2 | 8 | 9 | 2 | 5 | 8 | 2 | 9 | 2 | 9 | 6 | 6 | 4 | 9 | 4 | 2 | 1 | 2 | 3 | 6 | 1 | 1 | 2 | 2        |     |     |
|   | 9           | 9 | 2 | 3 | 8 | 8 | 3 | 3 | 9 | 9 | 0 | 4 | 8 | 6 | 7 | 9 | 7 | 1 | 7 | 1 | 6 | 2 | 1 | 7 | 7        |     |     |
|   | 0           | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0        |     |     |
|   | 0           | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0        |     |     |
|   | 1           | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1        |     |     |
|   | 2           | 2 | 2 | 2 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 4 | 5        |     |     |
|   | 6           | 7 | 8 | 9 | 0 | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 0 | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 0        |     |     |
| Pars Distalis, Hyperplasia                      | 2           | 2 | 1 |   | 2 |   |   |   |   | 1 | 3 |   |   |   |   |   |   | 3 | 2 | 2 |   |   | 1 | 1 | 19       | 2.0 |     |
| Thyroid Gland                                   | +           | + | + | + | + | + | + | + | + | + | A | + | + | + | + | + | + | + | + | A | + | + | + | + | +        | 48  |     |
| C-cell, Hyperplasia                             |             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |          | 4   | 2.8 |
| Follicular Cell, Hypertrophy                    | 2           | 2 |   | 2 | 3 |   | 3 | 1 |   | 2 |   | 1 | 2 |   | 2 | 1 | 3 | 3 | 2 |   | 3 | 3 |   | 2 | 2        | 33  | 2.1 |

**GENERAL BODY SYSTEM**

NONE

**GENITAL SYSTEM**

|                                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |     |
|--------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|-----|
| Epididymis                           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |
| Preputial Gland                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 49 |     |     |
| Cyst                                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3  | 3.3 |     |
| Prostate                             | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |
| Fibrosis                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2  | 2.0 |     |
| Hyperplasia                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 7  | 2.7 |     |
| Seminal Vesicle                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |
| Hypoplasia                           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 2.0 |     |
| Testes                               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |
| Atrophy                              | 1 | 1 |   | 1 | 1 | 1 |   | 2 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 1 | 2 | 2 | 2 |   | 2 | 2 |   | 2 | 3  | 35  | 1.7 |
| Pigmentation, Hemosiderin            |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   | 1  | 1.0 |     |
| Artery, Inflammation, Chronic Active | 3 | 2 |   |   |   | 1 |   | 3 | 2 | 2 | 2 |   |   |   |   | 2 | 1 | 2 | 3 | 2 | 3 | 2 | 3 | 2 | 3 | 33 | 2.3 |     |
| Interstitial Cell, Hyperplasia       | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 1.0 |     |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |    | * TOTALS |
|---|-------------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----|----------|
|   | 07<br>29    | 07<br>29 | 04<br>82 | 05<br>93 | 07<br>28 | 05<br>58 | 05<br>53 | 06<br>23 | 04<br>99 | 07<br>29 | 06<br>69 | 06<br>48 | 04<br>56 | 06<br>97 | 05<br>49 | 07<br>27 | 07<br>71 | 07<br>53 | 05<br>66 | 07<br>12 | 06<br>11 | 07<br>27 | 07<br>27 |    |          |
| ANIMAL ID                                       | 0016        | 0007     | 0008     | 0009     | 0011     | 0013     | 0015     | 0017     | 0019     | 0021     | 0023     | 0025     | 0027     | 0029     | 0031     | 0033     | 0035     | 0037     | 0039     | 0041     | 0043     | 0045     | 0047     | 50 |          |

**HEMATOPOIETIC SYSTEM**

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |        |       |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|----|--------|-------|
| Bone Marrow Hyperplasia                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | 50 | 4      | 2.3   |
| Lymph Node                                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 8  |        |       |
| Bronchial, Hemorrhage                            |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |        | 1 3.0 |
| Iliac, Infiltration Cellular, Histiocyte         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |        | 1 2.0 |
| Lumbar, Hemorrhage                               |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |        | 2 3.0 |
| Mediastinal, Ectasia                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |        | 1 3.0 |
| Mediastinal, Hemorrhage                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |        | 3 3.0 |
| Lymph Node, Mandibular Ectasia Hemorrhage        | + | + | + | + | + | + | + | + | + | + | + | + | + | + | M | + | + | + | + | + | + | + | + | 49 |    | 1 3.0  |       |
| Lymph Node, Mesenteric Lymphatic, Ectasia        | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |    | 1 3.0  |       |
| Spleen Hematopoietic Cell Proliferation Necrosis | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |    | 28 2.0 |       |
| Thymus Atrophy Hemorrhage                        | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 49 |    | 42 2.4 |       |

**INTEGUMENTARY SYSTEM**

|               |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |
|---------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|
| Mammary Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |
|---------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |                 |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|-----------------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST | 07   | 07   | 04   | 05   | 07   | 05   | 05   | 06   | 04   | 07   | 06   | 06   | 04   | 05   | 06   | 05   | 07   | 07   | 07   | 05   | 06   | 07   | 06   | 07   | 07   |                 |
|   | ANIMAL ID   | 0011 | 0012 | 0013 | 0014 | 0015 | 0016 | 0017 | 0018 | 0019 | 0020 | 0021 | 0022 | 0023 | 0024 | 0025 | 0026 | 0027 | 0028 | 0029 | 0030 | 0031 | 0032 | 0033 | 0034 | 0035 |                 |
|   |             | 29   | 29   | 28   | 29   | 28   | 28   | 23   | 23   | 29   | 29   | 00   | 04   | 08   | 06   | 07   | 09   | 04   | 02   | 01   | 02   | 03   | 06   | 01   | 01   | 02   | 02              |
|   |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | <b>* TOTALS</b> |

Fibrosis 1 2.0

Skin 50  
Cyst Epithelial Inclusion 2

MUSCULOSKELETAL SYSTEM

Bone 50  
Fibrous Osteodystrophy 13 3.1  
Maxilla, Fracture 1 2.0

NERVOUS SYSTEM

Brain 50  
Spinal Cord Degeneration 1 2.0

RESPIRATORY SYSTEM

Lung 50  
Edema 1 3.0  
Foreign Body 1  
Hemorrhage 1 1.0  
Hemorrhage, Multifocal 7 1.6  
Inflammation, Granulomatous 1 2.0  
Inflammation, Chronic 24 1.8  
Alveolar Epithelium, Hyperplasia 1 1.0  
Alveolus, Infiltration Cellular, Histiocyte 19 1.4  
Alveolus, Mineralization 1 3.0

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>150 mg/kg | DAY ON TEST |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | * TOTALS |
|---|-------------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|
|   | 07<br>29    | 07<br>29 | 04<br>82 | 05<br>93 | 07<br>28 | 05<br>88 | 05<br>83 | 06<br>63 | 04<br>92 | 07<br>99 | 06<br>60 | 06<br>64 | 04<br>88 | 05<br>66 | 06<br>97 | 05<br>49 | 07<br>27 | 07<br>71 | 05<br>31 | 06<br>66 | 07<br>12 | 06<br>11 | 07<br>27 | 07<br>27 |          |
| ANIMAL ID                                       | 001126      | 001127   | 001128   | 001129   | 001130   | 001131   | 001132   | 001133   | 001134   | 001135   | 001136   | 001137   | 001138   | 001139   | 001140   | 001141   | 001142   | 001143   | 001144   | 001145   | 001146   | 001147   | 001148   | 001149   | 001150   |

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |        |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|--------|
| Nose   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50     |
| Foreign Body                                 | X |   |   | X | X |   |   |   |   |   |   |   |   |   |   |   |   | X | X |   |   | X | X |   | 11     |
| Inflammation, Chronic Active                 | 1 |   |   | 2 | 2 |   |   |   |   |   |   |   |   |   |   |   |   | 1 |   | 2 | 1 |   | 2 | 2 | 16 1.7 |
| Respiratory Epithelium, Hyperplasia          |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   | 2 |   | 1 |   | 4 1.8  |
| Respiratory Epithelium, Metaplasia, Squamous |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 |   | 1 |   |   |   | 2 1.0  |

|              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |       |
|--------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|-------|
| Trachea      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Inflammation |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 | 1 2.0 |

SPECIAL SENSES SYSTEM

|                                     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |       |
|-------------------------------------|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|-------|
| Ear                                 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1     |
| External Ear, Hyperplasia, Squamous |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 1 3.0 |

|                                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |        |
|---------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|--------|
| Eye                                   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 49     |
| Anterior Chamber, Inflammation, Acute |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 | 4 2.3  |
| Cornea, Inflammation, Acute           |   |   |   |   |   |   | 2 | 1 |   |   |   |   |   |   |   | 2 |   | 2 | 1 | 3 |   | 3 |   | 17 2.3 |

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|
| Harderian Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 49 |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|

|                |  |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |       |
|----------------|--|---|--|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|-------|
| Lacrimal Gland |  |   |  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 4     |
| Degeneration   |  | + |  | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 4 2.5 |

URINARY SYSTEM

|                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |        |
|--------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|--------|
| Kidney                   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50     |
| Nephropathy              | 3 | 3 | 3 | 3 | 2 | 4 | 3 | 4 | 4 | 3 | 4 | 4 | 4 | 4 | 4 | 4 | 3 | 4 | 4 | 3 | 3 | 4 | 3 | 49 3.4 |
| Renal Tubule, Dilatation |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   | 1 3.0  |

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|
| Urinary Bladder | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |                    |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|--------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST | 0673  | 0727  | 0629  | 0477  | 0575  | 0498  | 0597  | 0665  | 0667  | 0589  | 0777  | 0777  | 0777  | 0778  | 0640  | 0415  | 0650  | 0388  | 0665  | 0727  | 0668  | 0450  | 0651  | 0761  | 0672  | males<br>(cont...) |
|   | ANIMAL ID   | 00151 | 00122 | 00133 | 00144 | 00155 | 00166 | 00177 | 00188 | 00199 | 00200 | 00211 | 00222 | 00233 | 00244 | 00255 | 00266 | 00277 | 00288 | 00299 | 00300 | 00311 | 00322 | 00333 | 00344 | 00355 |                    |
|   |             | 0773  | 0727  | 0629  | 0477  | 0575  | 0498  | 0597  | 0665  | 0667  | 0589  | 0777  | 0777  | 0777  | 0778  | 0640  | 0415  | 0650  | 0388  | 0665  | 0727  | 0668  | 0450  | 0651  | 0761  | 0672  |                    |

ALIMENTARY SYSTEM

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Esophagus                                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Intestine Large, Cecum                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Intestine Large, Colon                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Intestine Large, Rectum<br>Fibrosis             | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Intestine Small, Duodenum<br>Lymphatic, Ectasia | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Intestine Small, Ileum                          | + | + | + | + | A | + | + | A | + | + | + | + | + | + | + | A | + | + | A | A | + | + | + | + | A | + |
| Intestine Small, Jejunum<br>Lymphatic, Ectasia  | A | + | + | + | A | + | + | + | + | + | + | + | + | + | + | A | + | A | + | A | A | + | + | + | A | + |
| Liver   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Basophilic Focus                                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Cholangiofibrosis                               |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Clear Cell Focus                                |   | X |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   | X |   |
| Eosinophilic Focus                              |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   | X |   |
| Hepatodiaphragmatic Nodule                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X |   |
| Mixed Cell Focus                                |   | X |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |
| Necrosis  |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |
| Bile Duct, Cyst                                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Bile Duct, Fibrosis                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Bile Duct, Hyperplasia                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | ANIMAL ID | males<br>(cont...) |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|-----------|--------------------|
|   | 0673        | 0772 | 0622 | 0477 | 0577 | 0499 | 0599 | 0611 | 0611 | 0588 | 0677 | 0777 | 0777 | 0777 | 0664 | 0415 | 0650 | 0368 | 0665 | 0722 | 0658 | 0401 | 0661 | 0777 |           |                    |
|   | 0015        | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 |           |                    |

Oval Cell, Hyperplasia

1

Oral Mucosa

+ +

Hyperplasia, Squamous

Sebaceous Gland, Ectopic Tissue

X

Pancreas

+ +

Angiectasis

Acinus, Atrophy

1

1

Acinus, Hyperplasia

1

4

2

Artery, Inflammation, Chronic Active

2

3

1

2

2

2

2

2

3

2

Salivary Glands

+ +

Metaplasia

1

Stomach, Forestomach

+ +

Hyperplasia

2

2

2

2

2

2

3

3

2

2

2

1

Inflammation

Ulcer

Stomach, Glandular

+ +

Epithelium, Hyperplasia

2

2

Epithelium, Inflammation, Chronic Active

Epithelium, Mineralization

2

2

2

2

2

1

Tongue

+

CARDIOVASCULAR SYSTEM

Blood Vessel

+ +

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | males<br>(cont...) |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|--------------------|
|   | 0673        | 0727 | 0629 | 0477 | 0575 | 0498 | 0597 | 0665 | 0667 | 0589 | 0777 | 0777 | 0777 | 0778 | 0640 | 0412 | 0658 | 0336 | 0669 | 0667 | 0727 | 0668 | 0401 | 0661 | 0772 |                    |
| ANIMAL ID                                       | 00151       | 0012 | 0013 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011               |

Inflammation, Chronic Active Mineralization 2 3 1 2 2 1 2 1 2 2 2 1

Heart Cardiomyopathy Mineralization Atrium, Thrombosis + 3 3 1 3 1 2 3 3 2 2 2 1 2 3 3 3 3 3 1 2 1 2 1

**ENDOCRINE SYSTEM**

Adrenal Cortex Atrophy Degeneration, Cystic Degeneration, Fatty Hyperplasia Necrosis + 3 2 2 2 1 2 2 2 2

Adrenal Medulla Hyperplasia + 1 2 3 1 1 1 2 2 1

Islets, Pancreatic Hyperplasia + 1 4

Parathyroid Gland Hyperplasia + + + + + + + M + + + + + + + + + + + + + + + + 2 2 2 3 4 1

Pituitary Gland Pars Distalis, Hyperplasia + + + + + + + + + + + + + + M + + + + + + + + + + 2 3 1

Thyroid Gland +

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |                    |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|--------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST | 0673  | 0727  | 0629  | 0477  | 0575  | 0498  | 0597  | 0661  | 0589  | 0777  | 0777  | 0777  | 0778  | 0640  | 0415  | 0650  | 0368  | 0665  | 0722  | 0658  | 0401  | 0661  | 0771  | 0645  | 0771  | 0672  | males<br>(cont...) |
|   | ANIMAL ID   | 00151 | 00122 | 00133 | 00144 | 00155 | 00166 | 00177 | 00188 | 00199 | 00200 | 00211 | 00222 | 00233 | 00244 | 00255 | 00266 | 00277 | 00288 | 00299 | 00300 | 00311 | 00322 | 00333 | 00344 | 00355 | 00366 |                    |

C-cell, Hyperplasia  
 C-cell, Hypertrophy  
 Follicular Cell, Hypertrophy

3 3 3 4 3 2 4 3 2 3 1 2 2 2 3 2 3 2 1

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Epididymis  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Preputial Gland<br>Cyst<br>Inflammation   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|   | 3 |   |   |   |   |   |   | 3 | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Prostate<br>Fibrosis<br>Hyperplasia<br>Inflammation, Acute<br>Inflammation, Chronic Active  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|   |   |   | 2 |   |   |   | 2 |   |   |   | 2 |   |   | 1 |   |   |   |   |   |   | 1 |   |   |   |   |   |   |
| Seminal Vesicle<br>Inflammation, Acute  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|   |   |   |   |   |   |   |   |   |   | 4 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Testes<br>Atrophy<br>Artery, Inflammation, Chronic Active<br>Interstitial Cell, Hyperplasia | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|   | 2 |   | 1 |   | 2 |   | 1 |   |   | 2 | 1 | 1 |   |   | 2 | 2 | 1 |   | 1 | 1 | 1 | 1 | 1 |   |   |   |   |
|   | 2 |   |   |   | 2 |   |   |   |   | 2 | 2 | 2 | 3 |   | 3 | 2 | 3 | 2 |   | 1 | 3 | 2 | 2 |   |   |   |   |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue

M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |                    |      |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|--------------------|------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST | 0673 | 0722 | 0629 | 0477 | 0575 | 0499 | 0597 | 0661 | 0579 | 0777 | 0777 | 0777 | 0778 | 0640 | 0415 | 0658 | 0363 | 0665 | 0727 | 0668 | 0450 | 0651 | 0761 | 0671 | males<br>(cont...) |      |
|   | ANIMAL ID   | 0015 | 0012 | 0003 | 0004 | 0005 | 0006 | 0007 | 0008 | 0009 | 0010 | 0011 | 0012 | 0013 | 0014 | 0015 | 0016 | 0017 | 0018 | 0019 | 0020 | 0021 | 0022 | 0023 | 0024 |                    | 0025 |
|   |             | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    |                    | 0    |

HEMATOPOIETIC SYSTEM

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Bone Marrow Hyperplasia   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Lymph Node Angiectasis  |   |   |   | + |   |   |   | + |   |   |   |   |   |   |   |   |   |   |   |   | + |   |   |   |   |   |
| Mediastinal, Hemorrhage   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |
| Mediastinal, Infiltration Cellular, Lipocyte                    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Mediastinal, Pigmentation, Hemosiderin                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Pancreatic, Hemorrhage  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Renal, Pigmentation, Hemosiderin                                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Lymph Node, Mandibular Ectasia                                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Lymph Node, Mesenteric Hyperplasia, Lymphoid Lymphatic, Ectasia | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Spleen Atrophy  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Hematopoietic Cell Proliferation                                | 1 | 3 |   | 3 |   |   |   | 2 |   |   |   | 2 | 3 |   | 2 |   |   |   |   |   | 1 | 1 | 2 | 3 | 2 |   |
| Thymus Atrophy  | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
|   | 3 | 3 | 2 |   | 3 | 2 |   | 2 |   |   | 3 | 3 | 3 | 2 | 2 | 3 | 3 | 2 | 2 |   | 2 | 4 | 2 |   | 1 | 3 |

INTEGUMENTARY SYSTEM

|               |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Mammary Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|---------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |                    |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|--------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST | 0673  | 0722  | 0629  | 0477  | 0575  | 0498  | 0597  | 0665  | 0667  | 0589  | 0777  | 0777  | 0777  | 0778  | 0640  | 0415  | 0650  | 0368  | 0665  | 0727  | 0668  | 0401  | 0661  | 0751  | 0672  | males<br>(cont...) |
|   | ANIMAL ID   | 00151 | 00152 | 00153 | 00154 | 00155 | 00156 | 00157 | 00158 | 00159 | 00160 | 00161 | 00162 | 00163 | 00164 | 00165 | 00166 | 00167 | 00168 | 00169 | 00170 | 00171 | 00172 | 00173 | 00174 | 00175 |                    |
|   |             | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     |                    |

Inflammation

Skin

Cyst Epithelial Inclusion

Inflammation

Sebaceous Gland, Hyperplasia

MUSCULOSKELETAL SYSTEM

Bone

Fibrous Osteodystrophy

NERVOUS SYSTEM

Brain

Cyst Epithelial Inclusion

Necrosis

RESPIRATORY SYSTEM

Lung

Edema

Fibrosis

Hemorrhage

Hemorrhage, Multifocal

Inflammation, Chronic

Mineralization

Alveolar Epithelium, Hyperplasia

Alveolus, Infiltration Cellular, Histiocyte

Alveolus, Mineralization

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| DAY ON TEST | HARLAN SPRAGUE DAWLEY RATS MALE |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | ANIMAL ID | males (cont...) |
|-------------|---------------------------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|-----------|-----------------|
|             | 0673                            | 0727 | 0622 | 0477 | 0575 | 0499 | 0597 | 0661 | 0511 | 0689 | 0777 | 0777 | 0777 | 0778 | 0640 | 0415 | 0650 | 0368 | 0665 | 0722 | 0658 | 0401 | 0661 | 0751 |           |                 |
| 300 mg/kg   | 0015                            | 0012 | 0013 | 0011 | 0015 | 0015 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011 | 0011      |                 |

|                                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|-------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Nose                                | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Foreign Body                        |   |   | X |   |   |   | X |   | X | X |   | X |   | X |   |   |   |   |   |   |   |   |   |   |   |
| Inflammation, Chronic Active        |   |   | 2 |   |   |   | 1 |   | 2 | 2 | 1 | 1 |   | 1 |   |   |   |   |   |   |   | 1 |   |   |   |
| Respiratory Epithelium, Hyperplasia |   |   | 1 |   |   |   |   | 1 |   | 2 |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |

|         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Trachea | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|---------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|

SPECIAL SENSES SYSTEM

|                                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Eye                                   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Cataract                              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |
| Anterior Chamber, Inflammation, Acute |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |
| Cornea, Inflammation, Acute           |   |   | 1 | 2 |   |   |   | 2 |   | 2 | 1 | 2 |   | 1 |   | 3 |   |   |   |   | 2 |   | 2 |   |   |
| Retina, Fibrosis                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Harderian Gland                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Angiectasis                           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |

URINARY SYSTEM

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Kidney          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Cyst            |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Nephropathy     | 4 | 3 | 4 | 3 | 4 | 4 | 3 | 3 | 4 | 4 | 3 | 4 | 2 | 4 | 4 | 4 | 3 | 2 | 4 | 4 | 3 | 3 | 3 | 3 |   |
| Urinary Bladder | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Hemorrhage      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Inflammation    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |       |       |       |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|-------|-------|-------|
|   | 04          | 07    | 07    | 07    | 01    | 02    | 06    | 07    | 07    | 07    | 07    | 06    | 05    | 07    | 07    | 07    | 06    | 04    | 05    | 07    |          | 06    | 05    | 07    | 06    |
| ANIMAL ID                                       | 00176       | 00177 | 00178 | 00179 | 00180 | 00181 | 00182 | 00183 | 00184 | 00185 | 00186 | 00187 | 00188 | 00189 | 00190 | 00191 | 00192 | 00193 | 00194 | 00195 | 00196    | 00197 | 00198 | 00199 | 00200 |
|   | 0           | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0        | 0     | 0     | 0     | 0     |

**ALIMENTARY SYSTEM**

|   |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    |        |
|---|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|----|--------|
| Esophagus                                       | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |        |
| Intestine Large, Cecum                          | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |        |
| Intestine Large, Colon                          | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |        |
| Intestine Large, Rectum<br>Fibrosis             | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 | 1 1.0  |
| Intestine Small, Duodenum<br>Lymphatic, Ectasia | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 48 | 14 1.4 |
| Intestine Small, Ileum                          | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 38 |        |
| Intestine Small, Jejunum<br>Lymphatic, Ectasia  | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 42 | 41 2.0 |
| Liver   | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  | 50 |        |
| Basophilic Focus                                |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    | 1      |
| Cholangiofibrosis                               |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    | 1 2.0  |
| Clear Cell Focus                                |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    | 9      |
| Eosinophilic Focus                              |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    | 6      |
| Hepatodiaphragmatic Nodule                      |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    | 1      |
| Mixed Cell Focus                                |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    | 2      |
| Necrosis  |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    | 7 2.3  |
| Bile Duct, Cyst                                 |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    | 5 2.4  |
| Bile Duct, Fibrosis                             |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    | 1 1.0  |
| Bile Duct, Hyperplasia                          |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |    | 3 1.0  |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | * TOTALS |   |     |     |
|---|-------------|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----------|---|-----|-----|
|   | 04          | 07 | 07 | 07 | 01 | 02 | 06 | 07 | 07 | 07 | 07 | 06 | 05 | 07 | 07 | 07 | 06 | 04 | 05 | 07 | 06 | 05 | 07 | 06 | 05 |          |   |     |     |
| ANIMAL ID                                       | 06          | 02 | 01 | 02 | 09 | 05 | 01 | 02 | 02 | 02 | 04 | 01 | 00 | 02 | 00 | 06 | 09 | 03 | 01 | 01 | 03 | 02 | 02 | 03 | 01 |          |   |     |     |
|   | 00          | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 |          |   |     |     |
| Oval Cell, Hyperplasia                          |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1  | 1.0      |   |     |     |
| Oral Mucosa                                     | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 50       |   |     |     |
| Hyperplasia, Squamous                           |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 3        | 1 | 3.0 |     |
| Sebaceous Gland, Ectopic Tissue                 |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          | 1 |     |     |
| Pancreas  | +           | +  | +  | +  | +  | A  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 49 |          |   |     |     |
| Angiectasis                                     |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1        | 1 | 1.0 |     |
| Acinus, Atrophy                                 |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          | 2 | 1.0 |     |
| Acinus, Hyperplasia                             |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1        | 3 | 2   | 2.2 |
| Artery, Inflammation, Chronic Active            |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1        | 2 | 2   | 2.0 |
| Salivary Glands                                 | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 50 |          |   |     |     |
| Metaplasia                                      |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1        | 2 | 1.0 |     |
| Stomach, Forestomach                            | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 50 |          |   |     |     |
| Hyperplasia                                     | 2           | 2  | 2  |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1        | 3 | 1   | 1.8 |
| Inflammation                                    |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |   | 1   | 1.0 |
| Ulcer   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1        |   | 1   | 1.0 |
| Stomach, Glandular                              | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 50 |          |   |     |     |
| Epithelium, Hyperplasia                         |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |   | 2   | 2.0 |
| Epithelium, Inflammation, Chronic Active        |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |   | 2   | 2.0 |
| Epithelium, Mineralization                      |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1        | 2 | 3   | 1.8 |
| Tongue  |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |   |     | 1   |

CARDIOVASCULAR SYSTEM

Blood Vessel + 50

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |     |    | * TOTALS |
|---|-------------|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|-----|----|----------|
|   | 04          | 07 | 07 | 07 | 01 | 02 | 06 | 07 | 07 | 07 | 07 | 06 | 05 | 07 | 07 | 06 | 04 | 05 | 07 | 06 | 05 | 07 | 06 | 05  |    |          |
| ANIMAL ID                                       | 00          | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00  |    |          |
| Inflammation, Chronic Active Mineralization     | 1           | 2  | 2  |    |    |    | 2  | 2  | 2  | 2  | 3  |    | 2  |    | 2  | 2  | 2  | 3  | 2  | 2  |    | 2  | 2  | 29  |    |          |
|   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1.9 |    |          |
| Heart   | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 50  |    |          |
| Cardiomyopathy                                  | 3           | 2  | 3  |    | 1  | 2  | 2  | 2  | 3  | 3  | 3  | 3  | 3  | 3  | 3  | 3  | 3  | 2  | 2  | 3  | 1  | 1  | 3  | 48  |    |          |
| Mineralization                                  |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 2.4 |    |          |
| Atrium, Thrombosis                              |             |    |    |    |    |    | 3  | 3  | 4  |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 3   |    |          |
|   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 3.3 |    |          |
| <b>ENDOCRINE SYSTEM</b>                         |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |     |    |          |
| Adrenal Cortex                                  | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 50  |    |          |
| Atrophy   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1   |    |          |
| Degeneration, Cystic                            |             |    | 2  |    |    |    |    |    |    |    |    |    |    |    |    |    | 3  |    |    |    |    |    |    | 3.0 |    |          |
| Degeneration, Fatty                             |             | 2  |    | 1  |    |    |    |    | 2  |    | 2  | 3  |    | 1  |    | 2  | 3  |    |    | 1  |    |    | 1  | 4   |    |          |
| Hyperplasia                                     |             |    |    |    |    |    |    |    | 2  | 2  |    | 2  |    |    |    |    |    |    |    |    |    |    |    | 6   |    |          |
| Necrosis  | 1           |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 2   |    |          |
|   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1.5 |    |          |
| Adrenal Medulla                                 | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 50  |    |          |
| Hyperplasia                                     |             |    |    |    |    |    | 1  | 2  | 3  |    |    |    | 1  |    |    | 3  |    |    | 1  |    | 1  |    |    | 19  |    |          |
|   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1.5 |    |          |
| Islets, Pancreatic                              | +           | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 50  |    |          |
| Hyperplasia                                     |             |    |    |    |    |    |    |    |    |    |    |    |    |    | 1  |    |    |    |    |    |    |    |    | 3   |    |          |
|   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 2.0 |    |          |
| Parathyroid Gland                               | +           | +  | +  | +  | +  | M  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 47  |    |          |
| Hyperplasia                                     |             |    |    |    |    |    |    |    |    |    | 3  |    |    |    |    |    | 3  |    |    |    |    |    |    | 8   |    |          |
|   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 2.5 |    |          |
| Pituitary Gland                                 | +           | +  | +  | +  | +  | +  | I  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | 47  |    |          |
| Pars Distalis, Hyperplasia                      |             |    |    | 1  |    |    |    |    |    | 1  |    |    | 4  |    | 1  | 2  |    |    |    | 2  |    |    | 2  | 12  |    |          |
|   |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | 1  |    | 1.8 |    |          |
| Thyroid Gland                                   | +           | +  | A  | +  | +  | A  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | +  | A  | +  | +   | 47 |          |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03  
 Test Type: CHRONIC  
 Route: GAVAGE  
 Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**  
 Indole-3-carbinol  
 CAS Number: 700-06-1

Date Report Requested: 04/16/2013  
 Time Report Requested: 09:53:55  
 First Dose M/F: 03/14/07 / 03/15/07  
 Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | * TOTALS |          |          |          |          |          |        |
|---|-------------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|--------|
|   | 04<br>62    | 07<br>27 | 07<br>10 | 07<br>27 | 01<br>29 | 02<br>58 | 06<br>11 | 07<br>22 | 07<br>22 | 07<br>20 | 07<br>29 | 07<br>29 | 06<br>55 | 07<br>10 | 07<br>20 | 07<br>01 | 06<br>11 | 04<br>16 | 05<br>34 | 07<br>19 |          | 06<br>22 | 05<br>32 | 07<br>27 | 06<br>21 | 05<br>31 |        |
| ANIMAL ID                                       | 00176       | 00177    | 00178    | 00179    | 00180    | 00181    | 00182    | 00183    | 00184    | 00185    | 00186    | 00187    | 00188    | 00189    | 00190    | 00191    | 00192    | 00193    | 00194    | 00195    | 00196    | 00197    | 00198    | 00199    | 00200    |          |        |
| C-cell, Hyperplasia                             |             |          | 3        |          |          |          |          | 3        |          |          | 4        |          |          |          |          |          |          |          |          |          |          | 4        | 2        |          |          | 5 3.2    |        |
| C-cell, Hypertrophy                             |             |          |          |          |          |          |          |          |          |          |          |          | 2        |          |          |          |          |          |          |          |          |          |          |          |          | 1 2.0    |        |
| Follicular Cell, Hypertrophy                    | 2           |          |          | 2        | 3        |          | 3        |          | 2        | 3        | 3        |          | 2        | 4        |          |          |          | 2        | 4        | 2        | 3        | 2        |          | 3        | 1        | 4        | 36 2.6 |

**GENERAL BODY SYSTEM**

NONE

**GENITAL SYSTEM**

|                                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |       |
|--------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|-------|
| Epididymis                           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | 50  |       |
| Preputial Gland                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | 50  |       |
| Cyst                                 |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   | 3 |   |   |   |   |   |   |   |    |     | 5 2.8 |
| Inflammation                         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |    |     | 1 3.0 |
| Prostate                             | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | 50  |       |
| Fibrosis                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |    |     | 1 2.0 |
| Hyperplasia                          |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |    |     | 3 1.7 |
| Inflammation, Acute                  |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |    |     | 6 2.2 |
| Inflammation, Chronic Active         |   |   |   |   |   |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |    |     | 1 1.0 |
| Seminal Vesicle                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | 50  |       |
| Inflammation, Acute                  |   |   |   |   |   |   |   | 4 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     | 2 4.0 |
| Testes                               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | 50  |       |
| Atrophy                              | 2 | 1 | 1 | 1 |   |   | 1 | 2 | 2 | 2 | 1 | 4 |   | 1 |   | 2 | 4 | 3 |   | 1 | 2 |   | 1 | 1 | 33 | 1.6 |       |
| Artery, Inflammation, Chronic Active | 1 | 1 | 3 | 1 |   |   | 3 | 2 | 2 | 3 | 2 | 3 |   | 1 |   | 3 | 2 | 3 | 2 | 3 | 3 |   |   | 2 | 1  | 33  | 2.2   |
| Interstitial Cell, Hyperplasia       |   |   |   | 1 |   |   |   | 4 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     | 2 2.5 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| DAY ON TEST | HARLAN SPRAGUE DAWLEY RATS MALE |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | ANIMAL ID | * TOTALS |    |    |
|-------------|---------------------------------|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|-----------|----------|----|----|
|             | 04                              | 07 | 07 | 07 | 01 | 02 | 06 | 07 | 07 | 07 | 07 | 06 | 05 | 07 | 07 | 06 | 04 | 05 | 07 | 06 |           |          | 05 | 07 |
| 62          | 2                               | 7  | 0  | 7  | 0  | 8  | 1  | 2  | 0  | 9  | 9  | 5  | 9  | 6  | 9  | 1  | 6  | 4  | 9  | 2  | 2         | 7        | 1  | 1  |
| 00          | 00                              | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00        | 00       | 00 | 00 |
| 17          | 7                               | 7  | 8  | 7  | 8  | 8  | 1  | 8  | 8  | 8  | 8  | 8  | 8  | 8  | 9  | 9  | 9  | 9  | 9  | 9  | 9         | 9        | 9  | 0  |
| 67          | 7                               | 8  | 9  | 0  | 1  | 2  | 3  | 4  | 5  | 6  | 7  | 8  | 8  | 9  | 0  | 1  | 2  | 3  | 4  | 5  | 6         | 7        | 8  | 9  |

**HEMATOPOIETIC SYSTEM**

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     |        |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|-----|--------|
| Bone Marrow Hyperplasia   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   | 50     |
|   |   |   |   |   |   | 2 | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     | 3 2.0  |
| Lymph Node Angiectasis  | + |   |   |   |   |   |   |   |   |   |   |   | + |   |   |   |   |   |   |   |   |   |     | 6      |
| Mediastinal, Hemorrhage   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |     | 1 2.0  |
| Mediastinal, Infiltration Cellular, Lipocyte                    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     | 1 2.0  |
| Mediastinal, Pigmentation, Hemosiderin                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     | 1 3.0  |
| Pancreatic, Hemorrhage  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     | 1 3.0  |
| Renal, Pigmentation, Hemosiderin                                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     | 1 3.0  |
| Lymph Node, Mandibular Ectasia                                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   | 50     |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     | 1 3.0  |
| Lymph Node, Mesenteric Hyperplasia, Lymphoid Lymphatic, Ectasia | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   | 50     |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     | 1 2.0  |
|   |   |   |   |   |   | 2 | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     | 5 1.4  |
| Spleen Atrophy Hematopoietic Cell Proliferation                 | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +   | 50     |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |     | 1 3.0  |
|   |   |   |   |   |   | 2 | 1 | 2 |   |   |   |   | 2 | 2 | 1 | 2 | 2 |   |   |   |   |   |     | 29 2.0 |
| Thymus Atrophy  | + | + | + | + | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | M | +   | 47     |
|   | 3 | 1 | 1 | 1 |   | 1 | 4 |   | 2 | 2 | 3 | 3 | 2 | 2 | 2 | 3 | 2 | 4 | 4 | 4 | 2 |   | 2 4 | 41 2.5 |

**INTEGUMENTARY SYSTEM**

|               |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |
|---------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|
| Mammary Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |
|---------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST           |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | * TOTALS              |                       |                       |                       |                       |                       |
|---|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
|   | 0<br>4<br>6<br>2      | 0<br>7<br>2<br>7      | 0<br>7<br>1<br>0      | 0<br>7<br>2<br>7      | 0<br>1<br>9<br>0      | 0<br>2<br>5<br>8      | 0<br>6<br>1<br>1      | 0<br>7<br>2<br>2      | 0<br>7<br>2<br>2      | 0<br>7<br>2<br>2      | 0<br>7<br>2<br>2      | 0<br>6<br>4<br>1      | 0<br>5<br>1<br>9      | 0<br>7<br>0<br>6      | 0<br>7<br>6<br>1      | 0<br>6<br>9<br>6      | 0<br>4<br>3<br>4      | 0<br>5<br>1<br>9      | 0<br>7<br>1<br>2      | 0<br>6<br>3<br>2      |                       | 0<br>5<br>2<br>7      | 0<br>7<br>2<br>1      | 0<br>6<br>2<br>3      | 0<br>5<br>2<br>1      | 0<br>5<br>3<br>1      |
| ANIMAL ID                                       | 0<br>0<br>1<br>7<br>6 | 0<br>0<br>1<br>7<br>7 | 0<br>0<br>1<br>7<br>8 | 0<br>0<br>1<br>7<br>8 | 0<br>0<br>1<br>8<br>0 | 0<br>0<br>1<br>8<br>1 | 0<br>0<br>1<br>8<br>2 | 0<br>0<br>1<br>8<br>3 | 0<br>0<br>1<br>8<br>4 | 0<br>0<br>1<br>8<br>5 | 0<br>0<br>1<br>8<br>6 | 0<br>0<br>1<br>8<br>7 | 0<br>0<br>1<br>8<br>8 | 0<br>0<br>1<br>9<br>9 | 0<br>0<br>1<br>9<br>0 | 0<br>0<br>1<br>9<br>1 | 0<br>0<br>1<br>9<br>2 | 0<br>0<br>1<br>9<br>3 | 0<br>0<br>1<br>9<br>4 | 0<br>0<br>1<br>9<br>5 | 0<br>0<br>1<br>9<br>6 | 0<br>0<br>1<br>9<br>7 | 0<br>0<br>1<br>9<br>8 | 0<br>0<br>1<br>9<br>9 | 0<br>0<br>1<br>9<br>0 | 0<br>0<br>2<br>0<br>0 |
| Inflammation                                    | 3                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1 3.0                 |                       |                       |
| Skin  | +                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 50                    |                       |                       |
| Cyst Epithelial Inclusion                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 2                     |                       |                       |
| Inflammation                                    |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 2 3.5                 |                       |                       |
| Sebaceous Gland, Hyperplasia                    | 3                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1 3.0                 |                       |                       |
| <b>MUSCULOSKELETAL SYSTEM</b>                   |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| Bone  | +                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 50                    |                       |                       |
| Fibrous Osteodystrophy                          |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 8 3.1                 |                       |                       |
| <b>NERVOUS SYSTEM</b>                           |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| Brain   | +                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 50                    |                       |                       |
| Cyst Epithelial Inclusion                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1                     |                       |                       |
| Necrosis  |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 2 2.5                 |                       |                       |
| <b>RESPIRATORY SYSTEM</b>                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| Lung  | +                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 50                    |                       |                       |
| Edema   |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1 2.0                 |                       |                       |
| Fibrosis  |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1 2.0                 |                       |                       |
| Hemorrhage                                      | 1                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1 1.0                 |                       |                       |
| Hemorrhage, Multifocal                          | 1                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 7 1.9                 |                       |                       |
| Inflammation, Chronic                           | 3                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 23 1.8                |                       |                       |
| Mineralization                                  |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1 4.0                 |                       |                       |
| Alveolar Epithelium, Hyperplasia                |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1 1.0                 |                       |                       |
| Alveolus, Infiltration Cellular, Histiocyte     | 1 1 1 1               |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 13 1.2                |                       |                       |
| Alveolus, Mineralization                        |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1 2.0                 |                       |                       |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>MALE<br>300 mg/kg | DAY ON TEST |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    | * TOTALS |    |    |
|---|-------------|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----------|----|----|
|   | 04          | 07 | 07 | 07 | 01 | 02 | 06 | 07 | 07 | 07 | 07 | 06 | 05 | 07 | 07 | 07 | 06 | 04 | 05 | 07 | 06 | 05 | 07 | 06 | 05 |          |    |    |
| ANIMAL ID                                       | 06          | 02 | 07 | 00 | 07 | 00 | 08 | 01 | 02 | 00 | 09 | 09 | 05 | 09 | 06 | 09 | 01 | 01 | 06 | 09 | 03 | 01 | 01 | 03 | 02 | 02       | 03 | 01 |
|   | 00          | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00       | 00 | 00 |
|   | 11          | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11 | 11       | 11 | 11 |
|   | 77          | 77 | 77 | 77 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88 | 88       | 88 | 88 |
|   | 67          | 78 | 89 |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |          |    |    |

|                                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |
|-------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|
| Nose                                | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |
| Foreign Body                        |   |   |   |   |   |   |   |   | X |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X | 10 |     |
| Inflammation, Chronic Active        |   |   |   |   | 2 |   |   |   | 2 | 1 |   | 2 |   |   |   |   |   |   | 1 | 2 |   |   |   |   |   |   |   | 2 | 15 | 1.5 |
| Respiratory Epithelium, Hyperplasia |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   | 3 | 7  | 1.7 |

|         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |
|---------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|
| Trachea | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |
|---------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|

SPECIAL SENSES SYSTEM

|                                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |     |
|---------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|----|-----|
| Eye                                   | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 49 |    |     |
| Cataract                              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1  | 2.0 |
| Anterior Chamber, Inflammation, Acute |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2  | 3  | 2.0 |
| Cornea, Inflammation, Acute           |   |   |   | 2 |   | 2 | 3 | 1 | 2 |   | 2 | 3 |   |   |   | 1 |   | 1 |   |   |   | 2 |   |   |   |   |   | 2  | 21 | 1.9 |
| Retina, Fibrosis                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |    | 1  | 3.0 |

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|
| Harderian Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |
| Angiectasis     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 2.0 |

URINARY SYSTEM

|             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |     |
|-------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|-----|
| Kidney      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |
| Cyst        |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2  | 1   | 2.0 |
| Nephropathy | 4 | 3 | 3 | 3 | 2 | 2 | 4 | 3 | 3 | 3 | 3 | 4 | 3 | 3 | 3 | 4 | 3 | 4 | 4 | 4 | 4 | 4 | 3 | 3 | 4 | 4 |   |   | 50 | 3.4 |     |

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|---|-----|
| Urinary Bladder | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |   |     |
| Hemorrhage      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2  | 1 | 2.0 |
| Inflammation    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 1 | 1.0 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

---

\*\*\* END OF MALE DATA \*\*\*

---

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |                      |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST | 0509  | 0730  | 0729  | 0729  | 0614  | 0729  | 0665  | 0662  | 0770  | 0779  | 0661  | 0770  | 0779  | 0770  | 0779  | 0662  | 0663  | 0373  | 0779  | 0779  | 0770  | 0779  | 0538  | 0442  | females<br>(cont...) |
|   | ANIMAL ID   | 00201 | 00002 | 00003 | 00004 | 00005 | 00006 | 00007 | 00008 | 00009 | 00010 | 00011 | 00012 | 00013 | 00014 | 00015 | 00016 | 00017 | 00018 | 00019 | 00020 | 00021 | 00022 | 00023 | 00024 |                      |

ALIMENTARY SYSTEM

|                           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Esophagus                 | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Cecum    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Colon    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Rectum   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Duodenum | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Ileum    | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Jejunum  | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Liver                     | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Angiectasis               |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Basophilic Focus          |   |   |   |   |   |   |   |   |   |   | X | X | X | X | X |   |   |   | X | X | X |   |   |   |   |
| Clear Cell Focus          |   |   | X | X |   |   |   |   | X |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |
| Mixed Cell Focus          |   |   | X |   |   |   |   |   | X |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Necrosis                  |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Pigmentation              |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Bile Duct, Cyst           |   |   | 2 |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |
| Bile Duct, Cyst, Multiple |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   | 3 |   |   |   |   |   |
| Bile Duct, Hyperplasia    |   |   |   | 1 |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Oral Mucosa               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Pancreas                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST           |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | females<br>(cont...)  |
|---|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
|   | 0<br>5<br>0<br>9      | 0<br>7<br>3<br>0      | 0<br>7<br>2<br>9      | 0<br>7<br>2<br>9      | 0<br>6<br>1<br>4      | 0<br>7<br>2<br>9      | 0<br>6<br>4<br>5      | 0<br>6<br>4<br>2      | 0<br>7<br>3<br>0      | 0<br>7<br>1<br>9      | 0<br>6<br>8<br>1      | 0<br>7<br>3<br>0      | 0<br>7<br>2<br>9      | 0<br>7<br>3<br>0      | 0<br>6<br>2<br>9      | 0<br>6<br>4<br>2      | 0<br>3<br>7<br>3      | 0<br>7<br>3<br>0      | 0<br>7<br>1<br>9      | 0<br>7<br>3<br>0      | 0<br>7<br>1<br>9      | 0<br>5<br>3<br>8      | 0<br>4<br>2<br>2      |                       |                       |
| ANIMAL ID                                       | 0<br>0<br>2<br>0<br>1 | 0<br>0<br>2<br>0<br>2 | 0<br>0<br>2<br>0<br>3 | 0<br>0<br>2<br>0<br>4 | 0<br>0<br>2<br>0<br>5 | 0<br>0<br>2<br>0<br>6 | 0<br>0<br>2<br>0<br>7 | 0<br>0<br>2<br>0<br>8 | 0<br>0<br>2<br>0<br>9 | 0<br>0<br>2<br>0<br>0 | 0<br>0<br>2<br>1<br>1 | 0<br>0<br>2<br>1<br>2 | 0<br>0<br>2<br>1<br>3 | 0<br>0<br>2<br>1<br>4 | 0<br>0<br>2<br>1<br>5 | 0<br>0<br>2<br>1<br>6 | 0<br>0<br>2<br>1<br>7 | 0<br>0<br>2<br>1<br>8 | 0<br>0<br>2<br>2<br>9 | 0<br>0<br>2<br>2<br>0 | 0<br>0<br>2<br>2<br>1 | 0<br>0<br>2<br>2<br>2 | 0<br>0<br>2<br>2<br>3 | 0<br>0<br>2<br>2<br>4 | 0<br>0<br>2<br>2<br>5 |

Acinus, Hyperplasia  
Artery, Inflammation, Chronic Active

Salivary Glands  
Inflammation

Stomach, Forestomach  
Hyperplasia  
Inflammation  
Ulcer

Stomach, Glandular  
Ulcer  
Epithelium, Hyperplasia

Tongue  
Erosion

CARDIOVASCULAR SYSTEM

Blood Vessel  
Inflammation, Chronic Active

Heart  
Cardiomyopathy  
Epicardium, Inflammation

ENDOCRINE SYSTEM

Adrenal Cortex  
Degeneration, Cystic

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST      |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  | ANIMAL ID | females<br>(cont...) |                  |                  |
|---|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|------------------|-----------|----------------------|------------------|------------------|
|   | 0<br>5<br>0<br>9 | 0<br>7<br>3<br>0 | 0<br>7<br>2<br>0 | 0<br>7<br>2<br>9 | 0<br>6<br>1<br>4 | 0<br>7<br>2<br>9 | 0<br>6<br>4<br>5 | 0<br>6<br>4<br>2 | 0<br>7<br>3<br>0 | 0<br>7<br>1<br>9 | 0<br>6<br>8<br>1 | 0<br>7<br>3<br>0 | 0<br>7<br>2<br>9 | 0<br>7<br>3<br>0 | 0<br>6<br>2<br>2 | 0<br>6<br>4<br>2 | 0<br>3<br>7<br>3 | 0<br>7<br>2<br>9 | 0<br>7<br>1<br>9 | 0<br>7<br>3<br>0 |           |                      | 0<br>7<br>1<br>9 | 0<br>5<br>3<br>8 |
| Degeneration, Fatty                             |                  |                  |                  |                  |                  |                  | 2                |                  |                  |                  |                  |                  |                  |                  |                  |                  | 3                |                  |                  | 2                |           |                      |                  |                  |
| Hyperplasia                                     | 1                |                  |                  | 1                |                  |                  | 3                |                  |                  |                  |                  |                  | 2                | 2                |                  |                  |                  |                  | 3                |                  |           |                      |                  |                  |
| Hypertrophy                                     |                  |                  |                  |                  |                  |                  |                  |                  |                  | 1                |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |           |                      |                  |                  |
| Bilateral, Degeneration, Cystic                 |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |           |                      |                  |                  |
| Adrenal Medulla                                 | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +         | +                    | +                |                  |
| Hyperplasia                                     |                  | 1                |                  |                  |                  | 1                | 1                |                  | 1                |                  |                  | 1                |                  |                  |                  | 1                |                  |                  |                  |                  |           | 1                    |                  |                  |
| Islets, Pancreatic                              | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +         | +                    | +                |                  |
| Parathyroid Gland                               | +                | M                | +                | +                | M                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | M                | +                | +         | +                    | +                |                  |
| Pituitary Gland                                 | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +         | +                    | +                |                  |
| Pars Distalis, Hyperplasia                      |                  | 3                |                  | 1                |                  |                  |                  |                  |                  | 4                |                  |                  | 1                | 2                | 3                |                  |                  |                  | 2                |                  | 4         | 1                    | 2                |                  |
| Thyroid Gland                                   | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +                | +         | +                    | +                |                  |
| C-cell, Hyperplasia                             |                  |                  |                  |                  |                  |                  |                  |                  | 3                |                  |                  |                  |                  |                  | 2                | 2                |                  |                  |                  |                  | 1         |                      |                  |                  |
| Follicular Cell, Hyperplasia                    |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |                  |           |                      |                  |                  |
| Follicular Cell, Hypertrophy                    | 2                |                  | 1                |                  |                  |                  | 1                | 2                |                  | 1                |                  | 2                | 1                | 1                |                  |                  | 1                |                  | 2                | 2                | 2         | 3                    | 3                | 1                |

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

|                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Clitoral Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Cyst           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |
| Inflammation   |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Ovary          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST           |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | females<br>(cont...)  |                       |                       |                       |                       |
|---|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
|   | 0<br>5<br>0<br>9      | 0<br>7<br>3<br>0      | 0<br>7<br>2<br>9      | 0<br>7<br>2<br>9      | 0<br>6<br>1<br>4      | 0<br>7<br>2<br>9      | 0<br>6<br>4<br>5      | 0<br>6<br>4<br>2      | 0<br>7<br>3<br>0      | 0<br>7<br>1<br>9      | 0<br>6<br>8<br>1      | 0<br>7<br>3<br>0      | 0<br>7<br>2<br>9      | 0<br>7<br>3<br>0      | 0<br>6<br>2<br>9      | 0<br>6<br>3<br>2      | 0<br>6<br>4<br>2      | 0<br>3<br>7<br>3      | 0<br>7<br>2<br>9      | 0<br>7<br>1<br>0      |                       | 0<br>7<br>3<br>9      | 0<br>5<br>3<br>8      | 0<br>4<br>2<br>2      |                       |
| ANIMAL ID                                       | 0<br>0<br>2<br>0<br>1 | 0<br>0<br>2<br>0<br>2 | 0<br>0<br>2<br>0<br>3 | 0<br>0<br>2<br>0<br>4 | 0<br>0<br>2<br>0<br>5 | 0<br>0<br>2<br>0<br>6 | 0<br>0<br>2<br>0<br>7 | 0<br>0<br>2<br>0<br>8 | 0<br>0<br>2<br>0<br>9 | 0<br>0<br>2<br>1<br>0 | 0<br>0<br>2<br>1<br>1 | 0<br>0<br>2<br>1<br>2 | 0<br>0<br>2<br>1<br>3 | 0<br>0<br>2<br>1<br>4 | 0<br>0<br>2<br>1<br>5 | 0<br>0<br>2<br>1<br>6 | 0<br>0<br>2<br>1<br>7 | 0<br>0<br>2<br>1<br>8 | 0<br>0<br>2<br>2<br>9 | 0<br>0<br>2<br>2<br>0 | 0<br>0<br>2<br>2<br>1 | 0<br>0<br>2<br>2<br>2 | 0<br>0<br>2<br>2<br>3 | 0<br>0<br>2<br>2<br>4 | 0<br>0<br>2<br>2<br>5 |
| Atrophy   |                       | 2                     |                       |                       | 3                     | 3                     | 1                     | 1                     | 2                     | 2                     | 1                     | 1                     | 1                     | 2                     | 3                     | 4                     | 3                     | 2                     |                       | 2                     | 1                     | 2                     | 1                     | 1                     | 2                     |
| Cyst  | 3                     | 2                     | 2                     | 1                     |                       | 2                     |                       |                       | 1                     | 1                     |                       |                       | 2                     | 2                     | 3                     |                       |                       |                       |                       |                       |                       | 1                     |                       | 1                     |                       |
| Inflammation, Chronic Active                    |                       |                       |                       |                       |                       | 2                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| Uterus  | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     |                       |
| Dilatation                                      |                       |                       |                       |                       |                       |                       | 3                     |                       |                       |                       |                       |                       |                       |                       | 4                     | 3                     | 1                     | 3                     |                       |                       |                       |                       | 2                     |                       |                       |
| Inflammation, Histiocytic, Focal                |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| Inflammation, Acute                             |                       |                       |                       |                       | 1                     |                       |                       |                       |                       |                       | 1                     |                       |                       |                       |                       |                       |                       |                       |                       |                       | 2                     |                       |                       |                       |                       |
| Endometrium, Hyperplasia, Cystic                |                       | 1                     |                       |                       |                       | 1                     | 1                     |                       | 1                     | 2                     | 2                     | 1                     | 3                     | 2                     |                       |                       |                       |                       |                       | 2                     | 3                     | 3                     | 3                     | 2                     | 2                     |
| Endometrium, Metaplasia, Squamous               |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 1                     |                       |                       |                       | 3                     | 2                     | 2                     | 3                     |                       |                       |                       |                       |                       | 1                     |                       |
| Vagina  |                       |                       |                       |                       |                       |                       | +                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| <b>HEMATOPOIETIC SYSTEM</b>                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| Bone Marrow                                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     |                       |
| Hyperplasia                                     | 3                     |                       |                       |                       | 3                     |                       |                       | 3                     |                       | 2                     |                       |                       |                       | 2                     | 2                     | 3                     | 3                     |                       |                       |                       | 3                     |                       | 3                     |                       |                       |
| Lymph Node                                      |                       |                       |                       |                       | +                     |                       |                       | +                     |                       |                       |                       |                       |                       |                       |                       | +                     |                       |                       |                       |                       | +                     |                       |                       |                       |                       |
| Inguinal, Hyperplasia, Lymphoid                 |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| Lumbar, Hemorrhage                              |                       |                       |                       |                       |                       |                       |                       | 3                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 3                     |                       |                       |                       |                       |
| Lumbar, Hyperplasia, Lymphoid                   |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| Mediastinal, Hemorrhage                         |                       |                       |                       |                       | 4                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | 3                     |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| Mediastinal, Infiltration Cellular, Histiocyte  |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |
| Lymph Node, Mandibular                          | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     |                       |
| Lymph Node, Mesenteric                          | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     | +                     |                       |
| Pigmentation, Hemosiderin                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST           |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | ANIMAL ID | females<br>(cont...) |
|---|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------|----------------------|
|   | 0<br>5<br>0<br>9      | 0<br>7<br>3<br>0      | 0<br>7<br>2<br>9      | 0<br>7<br>2<br>9      | 0<br>6<br>1<br>4      | 0<br>7<br>2<br>9      | 0<br>6<br>4<br>5      | 0<br>6<br>4<br>2      | 0<br>7<br>3<br>0      | 0<br>7<br>1<br>9      | 0<br>6<br>8<br>1      | 0<br>7<br>3<br>0      | 0<br>7<br>2<br>9      | 0<br>7<br>3<br>0      | 0<br>6<br>2<br>9      | 0<br>6<br>3<br>2      | 0<br>6<br>4<br>2      | 0<br>3<br>7<br>3      | 0<br>7<br>3<br>0      | 0<br>7<br>2<br>9      | 0<br>7<br>1<br>9      | 0<br>7<br>3<br>0      | 0<br>7<br>1<br>9      | 0<br>5<br>3<br>8      | 0<br>4<br>2<br>2      |           |                      |
|   | 0<br>0<br>2<br>0<br>1 | 0<br>0<br>2<br>0<br>2 | 0<br>0<br>2<br>0<br>3 | 0<br>0<br>2<br>0<br>4 | 0<br>0<br>2<br>0<br>5 | 0<br>0<br>2<br>0<br>6 | 0<br>0<br>2<br>0<br>7 | 0<br>0<br>2<br>0<br>8 | 0<br>0<br>2<br>0<br>9 | 0<br>0<br>2<br>1<br>0 | 0<br>0<br>2<br>1<br>1 | 0<br>0<br>2<br>2<br>2 | 0<br>0<br>2<br>2<br>3 | 0<br>0<br>2<br>2<br>4 | 0<br>0<br>2<br>2<br>5 | 0<br>0<br>2<br>2<br>6 | 0<br>0<br>2<br>2<br>7 | 0<br>0<br>2<br>2<br>8 | 0<br>0<br>2<br>2<br>9 | 0<br>0<br>2<br>2<br>0 | 0<br>0<br>2<br>2<br>1 | 0<br>0<br>2<br>2<br>2 | 0<br>0<br>2<br>2<br>3 | 0<br>0<br>2<br>2<br>4 | 0<br>0<br>2<br>2<br>5 |           |                      |

Spleen  
Hematopoietic Cell Proliferation

+  
3 2 3 2 3 4 2 2 2 3 2 2 3 3 2 3 2 3 3 1 3 1

Thymus  
Atrophy  
Epithelial Cell, Hyperplasia

+  
2 2 4 3 4 2 3 1 3 1 3 2 2 2 2 2 2 2 2 2 2 2 2 2 1

INTEGUMENTARY SYSTEM

Mammary Gland  
Galactocele  
Hyperplasia  
Inflammation  
Inflammation, Chronic  
Duct, Dilatation

+  
1 2 1 1  
3

Skin

+ +

MUSCULOSKELETAL SYSTEM

Bone

+ +

Skeletal Muscle

+ +

NERVOUS SYSTEM

Brain  
Necrosis

+ +

RESPIRATORY SYSTEM

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue

M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| DAY ON TEST                |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
|----------------------------|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| HARLAN SPRAGUE DAWLEY RATS |  | 5 | 7 | 7 | 7 | 6 | 7 | 6 | 6 | 7 | 7 | 6 | 7 | 7 | 7 | 6 | 6 | 3 | 7 | 7 | 7 | 7 | 7 | 5 | 4 | 4 | 4 | 4 | 4 | 4 |
| FEMALE                     |  | 0 | 3 | 2 | 2 | 1 | 2 | 4 | 4 | 3 | 1 | 8 | 3 | 2 | 3 | 2 | 3 | 4 | 7 | 3 | 2 | 1 | 3 | 1 | 3 | 3 | 2 | 2 | 2 | 2 |
| 0 mg/kg                    |  | 9 | 0 | 0 | 9 | 4 | 9 | 5 | 2 | 0 | 9 | 1 | 0 | 9 | 0 | 9 | 2 | 2 | 0 | 9 | 9 | 9 | 0 | 9 | 8 | 2 | 2 | 2 | 2 | 2 |
| ANIMAL ID                  |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
|                            |  | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 | 2 |
|                            |  | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |
|                            |  | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 0 | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 0 | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 |

females (cont...)

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|--|
| Lung  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |  |
| Inflammation, Granulomatous                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |
| Inflammation, Chronic                       | 1 | 2 | 2 | 3 |   | 2 |   |   | 3 | 2 |   | 3 | 3 | 1 | 2 | 3 | 3 |   | 3 | 2 |   | 2 |   |   |   |   |   |   |   |  |
| Alveolus, Infiltration Cellular, Histiocyte |   | 2 |   |   | 3 |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 |  |
| Nose  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |  |
| Foreign Body                                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |
| Inflammation, Chronic Active                |   |   |   |   |   |   |   |   | 1 | 1 |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |
| Olfactory Epithelium, Degeneration          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |
| Trachea                                     | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |  |

SPECIAL SENSES SYSTEM

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Eye             | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Cataract        |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Harderian Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |

URINARY SYSTEM

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Kidney          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Nephropathy     | 2 | 1 | 1 | 2 | 1 | 2 | 1 | 1 | 2 |   | 2 |   | 1 | 1 | 2 | 3 | 1 | 1 | 2 | 2 | 2 | 2 | 2 | 1 | 1 | 2 |   |   |   |
| Urinary Bladder | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | * TOTALS |      |      |      |      |      |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|----------|------|------|------|------|------|
|   | 0688        | 0681 | 0488 | 0783 | 0585 | 0782 | 0782 | 0681 | 0482 | 0388 | 0680 | 0285 | 0484 | 0684 | 0783 | 0782 | 0783 | 0580 | 0782 | 0683 |          | 0789 | 0685 | 0783 | 0685 | 0581 |
| ANIMAL ID                                       | 0022        | 0022 | 0022 | 0022 | 0023 | 0023 | 0023 | 0023 | 0023 | 0023 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022     | 0022 | 0022 | 0022 | 0022 | 0022 |
|   | 0           | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0        | 0    | 0    | 0    | 0    | 0    |
|   | 6           | 6    | 4    | 7    | 5    | 7    | 7    | 6    | 4    | 3    | 6    | 2    | 5    | 4    | 6    | 7    | 7    | 7    | 5    | 7    | 6        | 7    | 6    | 7    | 6    | 5    |
|   | 8           | 1    | 8    | 3    | 5    | 2    | 2    | 1    | 2    | 8    | 0    | 8    | 5    | 4    | 4    | 3    | 2    | 3    | 0    | 2    | 9        | 3    | 9    | 3    | 5    | 1    |
|   | 8           | 1    | 8    | 0    | 8    | 9    | 9    | 7    | 5    | 9    | 7    | 8    | 2    | 6    | 5    | 0    | 9    | 0    | 2    | 9    | 0        | 5    | 0    | 6    | 3    |      |

ALIMENTARY SYSTEM

|                           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |       |
|---------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|-------|
| Esophagus                 | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Intestine Large, Cecum    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Intestine Large, Colon    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Intestine Large, Rectum   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Intestine Small, Duodenum | + | + | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 48    |
| Intestine Small, Ileum    | + | + | + | + | + | + | + | A | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 47    |
| Intestine Small, Jejunum  | + | + | + | + | + | + | + | A | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 47    |
| Liver                     | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Angiectasis               |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   | 1 1.0 |
| Basophilic Focus          | X |   |   | X | X |   |   |   |   |   |   |   |   |   |   |   |   |   | X |   | X |   | X |   |   | 14    |
| Clear Cell Focus          |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   | 6     |
| Mixed Cell Focus          |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   | 5     |
| Necrosis                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 2.0 |
| Pigmentation              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 3.0 |
| Bile Duct, Cyst           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 2.5 |
| Bile Duct, Cyst, Multiple |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 2.5 |
| Bile Duct, Hyperplasia    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 1.5 |
| Oral Mucosa               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |
| Pancreas                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |       |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|-------|
|   | 0688        | 0681  | 0488  | 0783  | 0585  | 0782  | 0782  | 0681  | 0482  | 0385  | 0687  | 0288  | 0585  | 0484  | 0684  | 0783  | 0782  | 0783  | 0580  | 0782  | 0683  | 0789  | 0685  | 0783  |          | 0686  | 0581  |
| ANIMAL ID                                       | 00226       | 00227 | 00228 | 00229 | 00230 | 00231 | 00232 | 00233 | 00234 | 00235 | 00236 | 00237 | 00238 | 00239 | 00240 | 00241 | 00242 | 00243 | 00244 | 00245 | 00246 | 00247 | 00248 | 00249 | 00250    | 00251 | 00252 |
|   | 0           | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0        | 0     | 0     |

|                                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |     |
|--------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|-----|
| Acinus, Hyperplasia                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 | 1  | 2.0 |     |
| Artery, Inflammation, Chronic Active |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3  | 1   | 3.0 |
| Salivary Glands Inflammation         | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | +   |     |
|                                      | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |     |
|                                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 50 | 1   | 2.0 |
| Stomach, Forestomach Hyperplasia     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |    | 2   | 2.0 |
| Inflammation                         |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1   | 1.0 |
| Ulcer                                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1   | 2.0 |
| Stomach, Glandular Ulcer             | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | +   |     |
| Epithelium, Hyperplasia              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |    | 1   | 2.0 |
| Tongue Erosion                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | + |    | 1   |     |
|                                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |    | 1   | 3.0 |

**CARDIOVASCULAR SYSTEM**

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|
| Blood Vessel Inflammation, Chronic Active | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 | 1  | 3.0 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Heart Cardiomyopathy                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  |     |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Epicardium, Inflammation                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 | 1 | 1  | 1   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 | 24 | 1.2 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 2.0 |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

**ENDOCRINE SYSTEM**

|                                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|-------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Adrenal Cortex Degeneration, Cystic | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |   |   |
|                                     | 1 | 2 |   | 2 |   | 2 | 2 |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|                                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 | 3 | 2 | 4 | 3 | 2 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | * TOTALS |      |      |      |      |      |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|----------|------|------|------|------|------|
|   | 0688        | 0681 | 0488 | 0783 | 0585 | 0782 | 0782 | 0681 | 0482 | 0385 | 0688 | 0285 | 0484 | 0684 | 0783 | 0782 | 0783 | 0580 | 0783 | 0689 |          | 0783 | 0685 | 0783 | 0685 | 0581 |
| ANIMAL ID                                       | 0022        | 0022 | 0022 | 0022 | 0023 | 0023 | 0023 | 0023 | 0023 | 0023 | 0023 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022 | 0022     | 0022 | 0022 | 0022 | 0022 | 0022 |

|                                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |     |     |
|---------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|----|-----|-----|
| Degeneration, Fatty             | 2 |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 5  | 2.4 |     |
| Hyperplasia                     | 2 | 3 |   | 2 |   | 4 |   |   |   | 4 | 1 |   | 1 |   | 1 |   |   |   | 2 |   | 1 |   | 4 |   | 4 |    | 18 | 2.3 |     |
| Hypertrophy                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    | 1   | 1.0 |
| Bilateral, Degeneration, Cystic |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 4 |   |   |   |   |   |   |    |    | 1   | 4.0 |
| Adrenal Medulla                 | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | 50 |     |     |
| Hyperplasia                     | 1 | 1 |   | 1 |   |   | 2 | 1 |   |   | 1 |   |   |   |   |   |   |   | 1 | 1 |   |   |   |   |   |    | 15 | 1.1 |     |
| Islets, Pancreatic              | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | 50 |     |     |
| Parathyroid Gland               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | 47 |     |     |
| Pituitary Gland                 | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | +  | 50 |     |     |
| Pars Distalis, Hyperplasia      |   |   | 1 | 4 |   | 2 | 2 | 4 | 3 |   |   |   |   |   |   | 3 |   |   |   |   |   |   | 3 |   | 3 |    | 19 | 2.5 |     |
| Thyroid Gland                   | + | + | + | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 49 |    |     |     |
| C-cell, Hyperplasia             | 3 |   |   | 2 |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 7  | 2.0 |     |
| Follicular Cell, Hyperplasia    |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1  | 2.0 |     |
| Follicular Cell, Hypertrophy    | 1 | 2 |   |   |   | 3 | 2 | 1 |   |   |   |   | 2 | 1 | 1 | 1 |   |   | 1 | 1 |   |   |   |   | 1 |    | 27 | 1.6 |     |

**GENERAL BODY SYSTEM**

NONE

**GENITAL SYSTEM**

|                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |
|----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|---|-----|
| Clitoral Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |   |     |
| Cyst           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   | 3 |   |   |   |   |    | 5 | 2.8 |
| Inflammation   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1 | 1.0 |
| Ovary          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |   |     |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |       |       |           |            |            |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|-------|-------|-----------|------------|------------|
|   | 0688        | 0681  | 0488  | 0783  | 0585  | 0782  | 0782  | 0681  | 0482  | 0385  | 0680  | 0288  | 0584  | 0684  | 0783  | 0782  | 0783  | 0580  | 0782  | 0683  |          | 0789  | 0685  | 0783  | 0685      | 0581       | 0683       |
| ANIMAL ID                                       | 00226       | 00227 | 00228 | 00229 | 00230 | 00231 | 00232 | 00233 | 00234 | 00235 | 00236 | 00237 | 00238 | 00239 | 00240 | 00241 | 00242 | 00243 | 00244 | 00245 | 00246    | 00247 | 00248 | 00249 | 00250     |            |            |
| Atrophy   | 2           |       | 1     | 2     |       | 3     |       | 1     | 1     | 1     | 3     |       | 3     | 1     | 3     | 2     | 1     | 1     |       | 2     | 3        |       | 4     | 3     | 1         | <b>40</b>  | <b>2.0</b> |
| Cyst  |             |       |       |       | 1     |       | 2     | 4     |       |       |       |       |       |       |       |       |       | 2     |       |       | 4        |       |       |       |           | <b>17</b>  | <b>2.0</b> |
| Inflammation, Chronic Active                    |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |           | <b>1</b>   | <b>2.0</b> |
| Uterus  | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +         | <b>50</b>  |            |
| Dilatation                                      |             |       |       |       |       |       |       |       |       | 4     |       | 1     |       |       |       |       |       | 2     |       |       |          |       |       |       |           | <b>9</b>   | <b>2.6</b> |
| Inflammation, Histiocytic, Focal                |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |           | <b>1</b>   | <b>1.0</b> |
| Inflammation, Acute                             |             |       |       | 1     |       |       |       |       |       |       |       |       |       | 1     |       |       |       |       |       |       |          |       |       |       |           | <b>5</b>   | <b>1.2</b> |
| Endometrium, Hyperplasia, Cystic                | 1           |       | 1     | 1     |       |       |       |       |       |       | 1     | 2     |       | 2     | 1     | 2     | 1     |       | 1     | 3     | 3        | 2     |       | 2     | <b>29</b> | <b>1.8</b> |            |
| Endometrium, Metaplasia, Squamous               |             |       | 1     |       |       | 3     |       | 1     |       |       |       |       |       | 2     |       |       |       | 3     |       |       |          |       |       | 1     | <b>12</b> | <b>1.9</b> |            |
| Vagina  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |           | <b>2</b>   |            |
| <b>HEMATOPOIETIC SYSTEM</b>                     |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |           |            |            |
| Bone Marrow                                     | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +         | <b>50</b>  |            |
| Hyperplasia                                     |             | 2     | 2     |       |       | 1     |       | 3     |       | 2     |       | 2     |       |       | 3     |       |       |       | 3     |       |          | 2     |       | 1     | 3         | <b>21</b>  | <b>2.4</b> |
| Lymph Node                                      |             |       |       |       |       | +     |       |       |       | +     |       |       |       |       |       |       |       |       |       |       |          |       |       |       |           | <b>7</b>   |            |
| Inguinal, Hyperplasia, Lymphoid                 |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          | 3     |       |       |           | <b>1</b>   | <b>3.0</b> |
| Lumbar, Hemorrhage                              |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |           | <b>2</b>   | <b>3.0</b> |
| Lumbar, Hyperplasia, Lymphoid                   |             |       |       |       |       |       |       |       |       |       | 3     |       |       |       |       |       |       |       |       |       |          |       |       |       |           | <b>1</b>   | <b>3.0</b> |
| Mediastinal, Hemorrhage                         |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |           | <b>2</b>   | <b>3.5</b> |
| Mediastinal, Infiltration Cellular, Histiocyte  |             |       |       |       |       | 2     |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |           | <b>1</b>   | <b>2.0</b> |
| Lymph Node, Mandibular                          | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +         | <b>50</b>  |            |
| Lymph Node, Mesenteric                          | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | +         | <b>50</b>  |            |
| Pigmentation, Hemosiderin                       |             |       |       |       | 2     |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |           | <b>1</b>   | <b>2.0</b> |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |    | * TOTALS |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----|----------|
|   | 0688        | 0681  | 0488  | 0730  | 0538  | 0729  | 0729  | 0617  | 0425  | 0369  | 0608  | 0254  | 0445  | 0630  | 0723  | 0700  | 0572  | 0730  | 0665  | 0733  | 0695  | 0630  | 0513  |       |    |          |
| ANIMAL ID                                       | 00226       | 00227 | 00228 | 00229 | 00230 | 00231 | 00232 | 00233 | 00234 | 00235 | 00236 | 00237 | 00238 | 00239 | 00240 | 00241 | 00242 | 00243 | 00244 | 00245 | 00246 | 00247 | 00248 | 00249 |    |          |
|   | 0           | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 50 |          |

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |     |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|----|-----|
| Spleen Hematopoietic Cell Proliferation | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 36 | 2.5 |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|----|-----|

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |     |     |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|----|-----|-----|
| Thymus Atrophy Epithelial Cell, Hyperplasia | + | + | M | + | + | + | + | + | M | + | + | + | + | + | + | M | + | + | + | + | + | + | + | + | 47 | 38 | 2.2 |     |
|   |   |   |   | 4 |   | 2 | 4 |   | 2 | 2 |   | 1 | 2 | 1 | 2 | 3 | 3 |   | 4 | 4 | 1 | 1 | 1 | 2 | 2  | 2  | 1   | 3.0 |

**INTEGUMENTARY SYSTEM**

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |   |     |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|---|---|-----|
| Mammary Gland Galactocele Hyperplasia Inflammation Inflammation, Chronic Duct, Dilatation | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 1 | 8 | 1.3 |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |   |     |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |   |     |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |   |     |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |   |     |
|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |   |     |

|      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |
|------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|
| Skin | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |
|------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|

**MUSCULOSKELETAL SYSTEM**

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|
| Bone            | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |
| Skeletal Muscle |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  |

**NERVOUS SYSTEM**

|                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |
|----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|---|-----|
| Brain Necrosis | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 1 | 3.0 |
|                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |

**RESPIRATORY SYSTEM**

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue

M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>0 mg/kg | DAY ON TEST |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        | * TOTALS |        |        |
|---|-------------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|--------|----------|--------|--------|
|   | 0688        | 0681   | 0648   | 0673   | 0655   | 0677   | 0677   | 0666   | 0644   | 0633   | 0662   | 0655   | 0644   | 0666   | 0677   | 0677   | 0655   | 0677   | 0666   | 0677   |          | 0666   | 0655   |
| ANIMAL ID                                       | 002226      | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022 | 000022   | 000022 |        |
| Lung  | +           | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +        | +      | 50     |
| Inflammation, Granulomatous                     |             |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |          |        | 1 1.0  |
| Inflammation, Chronic                           | 2           | 3      | 2      | 2      | 2      | 3      | 2      | 3      |        | 2      |        | 1      |        |        | 2      | 3      | 2      | 1      |        | 3      | 2        | 3      | 34 2.3 |
| Alveolus, Infiltration Cellular, Histiocyte     |             |        | 1      |        |        |        |        | 1      |        |        | 1      | 2      | 1      | 1      |        |        | 2      |        | 2      |        |          | 1      | 13 1.5 |
| Nose  | +           | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +        | +      | 49     |
| Foreign Body                                    |             |        | X      |        |        |        |        |        |        |        |        |        |        | X      |        |        |        |        |        |        |          |        | 3      |
| Inflammation, Chronic Active                    |             |        | 2      |        |        |        |        |        |        |        |        |        |        | 2      |        |        |        |        |        |        |          |        | 5 1.4  |
| Olfactory Epithelium, Degeneration              |             |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        | 1      |        |          |        | 1 1.0  |
| Trachea   | +           | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +        | +      | 50     |
| <b>SPECIAL SENSES SYSTEM</b>                    |             |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |          |        |        |
| Eye   | +           | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +        | +      | 50     |
| Cataract  |             |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |          |        | 1 2.0  |
| Harderian Gland                                 | +           | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +        | +      | 50     |
| <b>URINARY SYSTEM</b>                           |             |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |        |          |        |        |
| Kidney  | +           | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +        | +      | 50     |
| Nephropathy                                     | 1           | 1      | 1      | 2      | 1      | 1      | 2      | 1      | 2      |        | 3      |        | 1      | 2      | 3      | 2      | 2      |        | 2      | 3      | 2        | 3      | 45 1.7 |
| Urinary Bladder                                 | +           | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | +      | M      | +      | +      | +        | +      | 49     |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |      |                      |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|------|----------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>75 mg/kg | DAY ON TEST | 0719  | 0729  | 0779  | 0770  | 0662  | 0661  | 0552  | 0551  | 0662  | 0663  | 0771  | 0663  | 0367  | 0667  | 0777  | 0777  | 0777  | 0777  | 0777  | 0777  | 0373  | 0777  | 0777  | 0575  | 0777  | 0575 | females<br>(cont...) |
|  | ANIMAL ID   | 00251 | 00252 | 00253 | 00254 | 00255 | 00256 | 00257 | 00258 | 00259 | 00260 | 00261 | 00262 | 00263 | 00264 | 00265 | 00266 | 00267 | 00268 | 00269 | 00270 | 00271 | 00272 | 00273 | 00274 | 00275 |      |                      |
|  |             | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0    |                      |

ALIMENTARY SYSTEM

|                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |  |
|-----------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|--|--|
| Esophagus Inflammation      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |  |  |
| Intestine Large, Cecum      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |  |  |
| Intestine Large, Colon      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |  |  |
| Intestine Large, Rectum     | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |  |  |
| Intestine Small, Duodenum   | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | A | + | + | + | + |  |  |
| Intestine Small, Ileum      | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | A | + | + | + | + |  |  |
| Intestine Small, Jejunum    | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | A | A | + | + | + | + |  |  |
| Liver                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |  |  |
| Basophilic Focus            |   |   |   |   |   |   |   |   |   | X | X |   |   |   |   | X | X |   |   |   |   | X |   |   |   |   |   |  |  |
| Cholangiofibrosis           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |  |
| Clear Cell Focus            | X |   |   |   |   |   |   |   |   |   |   |   |   | X | X |   |   |   | X | X |   |   |   |   | X |   |   |  |  |
| Eosinophilic Focus          |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |  |  |
| Mixed Cell Focus            |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |  |  |
| Necrosis                    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |  |
| Thrombosis                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |  |
| Bile Duct, Cyst             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |  |
| Bile Duct, Cyst, Multiple   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |  |
| Centrilobular, Degeneration |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |  |
|                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |  |  |

Mesentery

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| <b>HARLAN SPRAGUE DAWLEY RATS</b><br><b>FEMALE</b><br><b>75 mg/kg</b> | DAY ON TEST | 0719  | 0729  | 0779  | 0770  | 0662  | 0661  | 0553  | 0662  | 0663  | 0771  | 0666  | 0337  | 0667  | 0667  | 0777  | 0777  | 0777  | 0777  | 0777  | 0337  | 0777  | 0777  | 0557  | 0777  | 0557  |
|   | ANIMAL ID   | 00251 | 00252 | 00253 | 00254 | 00255 | 00256 | 00257 | 00258 | 00259 | 00260 | 00261 | 00262 | 00263 | 00264 | 00265 | 00266 | 00267 | 00268 | 00269 | 00270 | 00271 | 00272 | 00273 | 00274 | 00275 |
|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |

females (cont...)

Artery, Inflammation, Chronic Active

Oral Mucosa

Pancreas

Acinus, Hyperplasia

Artery, Inflammation, Chronic Active

Salivary Glands

Stomach, Forestomach

Hyperplasia

Pigmentation, Melanin

Stomach, Glandular

Tongue

Inflammation

Tooth

CARDIOVASCULAR SYSTEM

Blood Vessel

Inflammation, Chronic Active

Heart

Cardiomyopathy

Atrium, Thrombosis

Epicardium, Inflammation

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|  |             |                   |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
|--|-------------|-------------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>75 mg/kg | DAY ON TEST | 0719              | 0729  | 0779  | 0770  | 0662  | 0661  | 0552  | 0551  | 0662  | 0663  | 0771  | 0663  | 0367  | 0667  | 0777  | 0770  | 0773  | 0772  | 0775  | 0370  | 0771  | 0772  | 0779  | 0775  | 0773  | 0779  | 0570  | 0773  | 0779  | 0775  | 0779  |       |       |       |       |
|  | ANIMAL ID   | 00251             | 00252 | 00253 | 00254 | 00255 | 00256 | 00257 | 00258 | 00259 | 00260 | 00261 | 00262 | 00263 | 00264 | 00265 | 00266 | 00267 | 00268 | 00269 | 00270 | 00271 | 00272 | 00273 | 00274 | 00275 | 00276 | 00277 | 00278 | 00279 | 00280 | 00281 | 00282 | 00283 | 00284 | 00285 |
|  | SEX         | females (cont...) |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |

ENDOCRINE SYSTEM

|                              |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
|------------------------------|---|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|--|
| Adrenal Cortex               | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Degeneration, Cystic         | 2 2 1 1 3 2 3   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Degeneration, Fatty          | 3   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Hyperplasia                  | 1 2   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Inflammation                 | 1   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Thrombosis                   |   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Adrenal Medulla              | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Hyperplasia                  | 2 2 1 2 1   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Islets, Pancreatic           | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Parathyroid Gland            | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Hyperplasia                  | 1 1   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Pituitary Gland              | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Pars Distalis, Hyperplasia   | 3 2 3 2 1 2 4   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Thyroid Gland                | + |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| C-cell, Hyperplasia          | 2 1   |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |
| Follicular Cell, Hypertrophy | 2 1 3 2 1 1 3 2 2 1 3 1 2                               |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |  |

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>75 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | ANIMAL ID | females<br>(cont...) |
|--|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|-----------|----------------------|
|  | 0719        | 0729 | 0779 | 0770 | 0622 | 0661 | 0551 | 0662 | 0663 | 0773 | 0665 | 0369 | 0665 | 0770 | 0779 | 0770 | 0770 | 0777 | 0777 | 0772 | 0305 | 0733 | 0779 | 0779 |           |                      |
|  | 0           | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0         |                      |
|  | 0           | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0    | 0         |                      |
|  | 2           | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2    | 2         |                      |
|  | 5           | 5    | 5    | 5    | 5    | 5    | 5    | 5    | 5    | 5    | 6    | 6    | 6    | 6    | 6    | 6    | 6    | 6    | 6    | 7    | 7    | 7    | 7    | 7    | 7         |                      |
|  | 1           | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    | 1    | 2    | 3    | 4    | 5         |                      |

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Clitoral Gland Cyst                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Ovary Atrophy                            | + | 2 |   |   |   |   |   |   |   |   |   |   | 3 |   | 3 |   |   |   |   |   |   |   |   |   |   |
| Ovary Cyst                               |   |   |   | 1 | 3 |   |   |   | 1 |   |   |   |   | 4 |   | 3 | 2 | 3 |   |   |   |   |   | 3 |   |
| Ovary Inflammation, Chronic Active       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Uterus Dilatation                        | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |
| Uterus Inflammation, Acute               |   |   |   |   | 2 |   |   |   | 1 |   |   |   | 2 |   |   |   |   | 4 |   |   |   |   |   |   |   |
| Uterus Endometrium, Hyperplasia, Cystic  | 3 | 3 |   | 1 | 1 |   | 1 | 1 |   | 2 | 1 |   |   |   | 2 |   |   |   |   |   | 2 |   | 1 | 2 | 2 |
| Uterus Endometrium, Metaplasia, Squamous |   |   |   | 1 | 1 |   |   |   | 2 |   |   |   | 3 |   |   |   | 3 |   |   |   |   |   | 2 |   |   |
| Vagina                                   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | + |

**HEMATOPOIETIC SYSTEM**

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Bone Marrow Atrophy                                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Bone Marrow Hyperplasia                              | 2 |   |   |   | 2 |   |   | 2 | 2 | 1 | 2 |   | 3 |   |   |   | 2 |   |   |   | 1 |   | 3 |   | 3 |
| Lymph Node Iliac, Hyperplasia, Lymphoid              |   |   |   | + |   |   |   |   |   | + |   |   |   |   |   |   |   |   |   |   |   |   |   |   | + |
| Lymph Node Inguinal, Hemorrhage                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |
| Lymph Node Lumbar, Hemorrhage                        |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Lymph Node Lumbar, Hyperplasia, Lymphoid             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Lymph Node Lumbar, Infiltration Cellular, Histiocyte |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>75 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | females<br>(cont...) |      |      |      |      |      |
|--|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|----------------------|------|------|------|------|------|
|  | 0719        | 0729 | 0779 | 0770 | 0622 | 0661 | 0551 | 0662 | 0663 | 0773 | 0663 | 0367 | 0667 | 0665 | 0770 | 0779 | 0770 | 0770 | 0770 | 0770 | 0770 | 0770 | 0373 | 0771 |                      | 0772 | 0509 | 0119 | 0119 | 0229 |
| ANIMAL ID  | 00251       | 0002 | 0003 | 0004 | 0005 | 0006 | 0007 | 0008 | 0009 | 0010 | 0011 | 0012 | 0013 | 0014 | 0015 | 0016 | 0017 | 0018 | 0019 | 0020 | 0021 | 0022 | 0023 | 0024 | 0025                 | 0026 | 0027 | 0028 | 0029 | 0030 |

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Lymph Node, Mandibular                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | M | + | + | + |   |   |   |
| Lymph Node, Mesenteric                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Spleen<br>Hematopoietic Cell Proliferation   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Thymus<br>Atrophy                            |   | 3 | 2 |   | 3 | 2 | 1 | 2 |   | 1 |   |   |   |   |   |   | 2 | 3 | 3 | 1 |   |   |   |   |   |   |   |   |   |
| Inflammation<br>Epithelial Cell, Hyperplasia |   |   |   |   | 2 |   |   |   |   | 4 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

INTEGUMENTARY SYSTEM

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Mammary Gland<br>Hyperplasia<br>Inflammation | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Skin<br>Cyst Epithelial Inclusion            | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |

MUSCULOSKELETAL SYSTEM

|                                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Bone<br>Fibrous Osteodystrophy | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|--------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|

NERVOUS SYSTEM

|                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Brain<br>Gliosis | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| <b>HARLAN SPRAGUE DAWLEY RATS</b><br><b>FEMALE</b><br><b>75 mg/kg</b> | DAY ON TEST | 0719  | 0719  | 0719  | 0719  | 0661  | 0661  | 0551  | 0662  | 0663  | 0712  | 0663  | 0365  | 0667  | 0717  | 0717  | 0717  | 0717  | 0717  | 0717  | 0720  | 0371  | 0719  | 0719  | 0509  | 0719  | 0719  | 0509  |
|   | ANIMAL ID   | 00251 | 00252 | 00253 | 00254 | 00255 | 00256 | 00257 | 00258 | 00259 | 00260 | 00261 | 00262 | 00263 | 00264 | 00265 | 00266 | 00267 | 00268 | 00269 | 00270 | 00271 | 00272 | 00273 | 00274 | 00275 | 00276 | 00277 |
|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |

females (cont...)

|                              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Eye Inflammation             | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Harderian Gland Inflammation | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |

URINARY SYSTEM

|                    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Kidney Nephropathy | 2 | 2 | 1 | 2 | 2 | 2 | 3 | 1 | 3 | 3 | 2 |   | 1 | 2 | 1 |   | 2 | 3 | 2 | 3 | 2 |   | 2 | 2 | 2 |   |   |   |
| Urinary Bladder    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|
| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>75 mg/kg | DAY ON TEST | 0729  | 0645  | 0730  | 0761  | 0667  | 0733  | 0645  | 0642  | 0661  | 0734  | 0741  | 0744  | 0773  | 0669  | 0746  | 0770  | 0664  | 0733  | 0713  | 0773  | 0773  | * TOTALS |
|  | ANIMAL ID   | 00276 | 00277 | 00278 | 00279 | 00280 | 00281 | 00282 | 00283 | 00284 | 00285 | 00286 | 00287 | 00288 | 00289 | 00290 | 00291 | 00292 | 00293 | 00294 | 00295 | 00296 |          |
|  |             | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     |          |

ALIMENTARY SYSTEM

|                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |     |
|-----------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|-----|
| Esophagus Inflammation      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 2   | 2.0 |
| Intestine Large, Cecum      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |
| Intestine Large, Colon      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |
| Intestine Large, Rectum     | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |
| Intestine Small, Duodenum   | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 47 |     |     |
| Intestine Small, Ileum      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | A | + | + | + | + | + | + | 47 |     |     |
| Intestine Small, Jejunum    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | A | + | + | + | + | + | + | + | 46 |     |     |
| Liver                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |
| Basophilic Focus            |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 6  |     |     |
| Cholangiofibrosis           |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 1.0 |     |
| Clear Cell Focus            |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   | 7  |     |     |
| Eosinophilic Focus          |   |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   | X |   |   |   |   |   | 4  |     |     |
| Mixed Cell Focus            |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  |     |     |
| Necrosis                    |   |   |   |   |   |   |   |   | 4 |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2  | 3.5 |     |
| Thrombosis                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   | 1  | 2.0 |     |
| Bile Duct, Cyst             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   | 1  | 2.0 |     |
| Bile Duct, Cyst, Multiple   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   | 1  | 2.0 |     |
| Centrilobular, Degeneration |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 3.0 |     |
| Mesentery                   | + |   |   |   |   |   |   |   | + |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2  |     |     |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>75 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|
|  | 0729        | 0645  | 0730  | 0730  | 0661  | 0667  | 0763  | 0664  | 0492  | 0661  | 0378  | 0474  | 0442  | 0736  | 0666  | 0470  | 0773  | 0663  | 0373  | 0178  |          | 0773  |
| ANIMAL ID  | 00276       | 00077 | 00008 | 00009 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000 | 00000    |       |
| Artery, Inflammation, Chronic Active             | 3           |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          | 1 3.0 |
| Oral Mucosa                                      | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | 50    |
| Pancreas   | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | 49    |
| Acinus, Hyperplasia                              |             |       |       |       |       |       |       |       |       |       |       |       |       | 2     |       |       |       |       | 1     |       |          | 3 1.3 |
| Artery, Inflammation, Chronic Active             |             |       |       |       |       |       | 2     |       |       |       |       |       |       |       | 1     |       |       |       |       |       |          | 4 1.5 |
| Salivary Glands                                  | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | 49    |
| Stomach, Forestomach                             | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | 50    |
| Hyperplasia                                      | 3           |       |       |       |       |       | 4     |       |       |       |       |       |       |       |       | 3     |       |       |       |       |          | 5 2.4 |
| Pigmentation, Melanin                            |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 2     |       |          | 1 2.0 |
| Stomach, Glandular                               | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | 49    |
| Tongue   | +           |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          | 1     |
| Inflammation                                     | 3           |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          | 1 3.0 |
| Tooth  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          | 1     |

**CARDIOVASCULAR SYSTEM**

|                              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |       |        |
|------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|-------|--------|
| Blood Vessel                 | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |        |
| Inflammation, Chronic Active | 1 |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 1.3 |        |
| Heart                        | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50    |        |
| Cardiomyopathy               | 1 |   | 2 | 2 |   | 2 | 1 | 1 | 1 |   | 1 |   |   | 1 | 2 |   | 3 | 2 | 1 |   | 2 | 1     | 24 1.7 |
| Atrium, Thrombosis           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 4 |   |   |   |   |   | 1 4.0 |        |
| Epicardium, Inflammation     |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   | 3 2.3 |        |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>75 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|
|  | 0729        | 0645  | 0730  | 0730  | 0661  | 0667  | 0763  | 0664  | 0495  | 0641  | 0368  | 0742  | 0482  | 0442  | 0737  | 0666  | 0466  | 0770  | 0663  | 0375  | 0713  | 0773  | 0773  |       |          |
| ANIMAL ID  | 00276       | 00077 | 00008 | 00009 | 00000 | 00001 | 00002 | 00003 | 00004 | 00005 | 00006 | 00007 | 00008 | 00009 | 00010 | 00011 | 00012 | 00013 | 00014 | 00015 | 00016 | 00017 | 00018 | 00019 |          |
|  | 0           | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 50    |          |
|  | 2           | 4     | 3     | 3     | 1     | 7     | 3     | 4     | 9     | 1     | 8     | 2     | 8     | 2     | 3     | 6     | 6     | 0     | 3     | 6     | 3     | 3     | 8     | 3     | 12       |
|  | 9           | 5     | 0     | 0     | 6     | 0     | 0     | 5     | 2     | 1     | 8     | 9     | 1     | 0     | 0     | 9     | 3     | 6     | 0     | 4     | 5     | 0     | 7     | 3     | 2.1      |
|  | 0           | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 2.0      |
|  | 2           | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 2     | 3     | 2.0      |
|  | 7           | 7     | 7     | 7     | 8     | 8     | 8     | 8     | 8     | 8     | 8     | 8     | 8     | 8     | 9     | 9     | 9     | 9     | 9     | 9     | 9     | 9     | 9     | 0     | 1.0      |
|  | 6           | 7     | 8     | 9     | 0     | 1     | 2     | 3     | 4     | 5     | 6     | 7     | 8     | 9     | 0     | 1     | 2     | 3     | 4     | 5     | 6     | 7     | 8     | 9     | 2.0      |

ENDOCRINE SYSTEM

|                              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |  |
|------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|--|
| Adrenal Cortex               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |  |
| Degeneration, Cystic         |   | 2 |   |   |   |   | 2 |   | 2 |   |   |   | 3 |   |   |   |   |   | 2 |   |   |   |   |   | 12 | 2.1 |  |
| Degeneration, Fatty          |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   | 3 |   |   |   | 2 | 2 | 3  | 2.0 |  |
| Hyperplasia                  |   |   |   | 1 | 3 |   | 2 |   |   |   |   |   |   | 2 |   |   | 2 |   | 3 |   |   |   | 2 | 2 | 11 | 2.0 |  |
| Inflammation                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 1.0 |  |
| Thrombosis                   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   | 1  | 2.0 |  |
| Adrenal Medulla              | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |  |
| Hyperplasia                  |   | 2 | 2 | 1 |   | 2 | 3 |   |   |   |   |   |   |   | 1 |   |   |   |   |   | 1 |   | 3 |   | 13 | 1.8 |  |
| Islets, Pancreatic           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |  |
| Parathyroid Gland            | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | M | + | + | +  | 49  |  |
| Hyperplasia                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2  | 1.0 |  |
| Pituitary Gland              | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |  |
| Pars Distalis, Hyperplasia   |   |   |   |   | 1 | 3 |   | 2 | 1 |   |   |   |   |   |   |   |   |   |   |   | 2 | 1 | 2 |   | 14 | 2.1 |  |
| Thyroid Gland                | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 49 |     |  |
| C-cell, Hyperplasia          |   | 2 |   |   | 2 |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   | 5  | 2.0 |  |
| Follicular Cell, Hypertrophy |   |   |   | 1 |   | 1 | 1 |   |   |   | 1 |   |   |   |   |   | 1 | 1 | 2 |   | 4 |   | 1 | 2 | 23 | 1.7 |  |

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>75 mg/kg | DAY ON TEST |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          |          | * TOTALS |
|--|-------------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|----------|
|  | 07<br>29    | 06<br>45 | 07<br>30 | 07<br>30 | 06<br>16 | 06<br>60 | 07<br>30 | 06<br>45 | 04<br>92 | 06<br>11 | 03<br>78 | 04<br>41 | 07<br>20 | 06<br>69 | 04<br>36 | 07<br>03 | 06<br>64 | 03<br>35 | 07<br>30 | 01<br>73 |          |
| ANIMAL ID  | 00276       | 00078    | 00009    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    | 00000    |

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |     |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|-----|
| Clitoral Gland Cyst                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 2   | 2.5 |
| Ovary Atrophy                            | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 23  | 2.0 |
| Ovary Cyst                               |   | 2 |   | 2 |   |   |   | 3 |   |   | 3 | 1 |   |   |   |   |   |   |   |   |   |   |   |   | 13 | 2.4 |     |
| Ovary Inflammation, Chronic Active       |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 3.0 |     |
| Uterus Dilatation                        | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 9   | 3.4 |
| Uterus Inflammation, Acute               | 3 | 3 |   | 3 |   | 4 |   | 2 |   | 2 |   |   |   |   |   |   |   | 2 |   | 3 |   | 1 |   | 1 | 12 | 2.1 |     |
| Uterus Endometrium, Hyperplasia, Cystic  |   |   | 1 |   |   |   |   |   |   |   | 1 | 1 | 2 | 1 | 2 | 2 |   | 1 | 1 | 2 | 2 | 1 | 3 | 1 | 3  | 28  | 1.6 |
| Uterus Endometrium, Metaplasia, Squamous | 3 | 3 | 2 | 2 | 2 | 3 |   |   |   |   |   |   | 2 | 1 | 1 |   |   |   |   | 3 |   | 2 |   | 3 | 18 | 2.2 |     |
| Vagina                                   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1   |     |

**HEMATOPOIETIC SYSTEM**

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |     |     |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|-----|-----|
| Bone Marrow Atrophy                                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 1   | 3.0 |     |
| Bone Marrow Hyperplasia                              | 2 |   | 1 |   | 1 | 2 |   | 2 |   |   | 1 |   |   |   |   | 2 |   | 2 |   |   |   | 3 |   |   | 20 | 2.0 |     |     |
| Lymph Node Iliac, Hyperplasia, Lymphoid              |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 6   | 1   | 2.0 |
| Lymph Node Inguinal, Hemorrhage                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1   | 3.0 |     |
| Lymph Node Lumbar, Hemorrhage                        |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |    | 1   | 3.0 |     |
| Lymph Node Lumbar, Hyperplasia, Lymphoid             | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 3.0 |     |     |
| Lymph Node Lumbar, Infiltration Cellular, Histiocyte |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1  | 2.0 |     |     |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>75 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |       |       |        |        |
|--|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|-------|-------|--------|--------|
|  | 079         | 0645  | 0730  | 0730  | 0661  | 0660  | 0730  | 0660  | 0495  | 0641  | 0368  | 0742  | 0482  | 0470  | 0636  | 0466  | 0703  | 0660  | 0364  | 0735  |          |       | 0137  | 0730  | 0773   |        |
| ANIMAL ID  | 00276       | 00027 | 00028 | 00029 | 00030 | 00031 | 00032 | 00033 | 00034 | 00035 | 00036 | 00037 | 00038 | 00039 | 00040 | 00041 | 00042 | 00043 | 00044 | 00045 | 00046    | 00047 | 00048 | 00049 |        |        |
| Lymph Node, Mandibular                           | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 49     |        |
| Lymph Node, Mesenteric                           | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 50     |        |
| Spleen   | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | 50    |        |        |
| Hematopoietic Cell Proliferation                 | 2           |       |       |       | 3     | 3     | 2     | 3     | 4     | 2     |       |       |       | 2     |       | 3     |       | 2     | 1     | 3     | 3        | 2     |       | 2     | 32 2.4 |        |
| Thymus   | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | 50    |        |        |
| Atrophy  | 3           |       | 1     |       | 4     |       | 2     | 3     | 4     | 2     |       |       |       | 4     | 1     | 3     |       |       | 1     | 3     |          | 2     | 2     | 3     | 1      | 31 2.3 |
| Inflammation                                     |             |       |       |       |       |       |       |       |       |       |       |       |       | 3     |       |       |       |       |       |       |          |       |       |       | 1 3.0  |        |
| Epithelial Cell, Hyperplasia                     |             |       |       |       |       |       |       |       |       |       | 3     |       |       |       |       |       |       | 4     |       |       |          |       |       |       | 4 3.3  |        |
| <b>INTEGUMENTARY SYSTEM</b>                      |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |        |        |
| Mammary Gland                                    | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 50     |        |
| Hyperplasia                                      |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       | 3 1.0  |        |
| Inflammation                                     | 3           |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       | 1 3.0  |        |
| Skin   | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 50     |        |
| Cyst Epithelial Inclusion                        |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       | 1      |        |
| <b>MUSCULOSKELETAL SYSTEM</b>                    |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |        |        |
| Bone   | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 50     |        |
| Fibrous Osteodystrophy                           |             |       |       |       | 3     |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       | 1 3.0  |        |
| <b>NERVOUS SYSTEM</b>                            |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       |        |        |
| Brain  | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 50     |        |
| Gliosis  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       | 2     |       | 1 2.0  |        |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue

M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked





Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |                      |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|----------------------|
| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>150 mg/kg | DAY ON TEST | 0611 | 0446 | 0661 | 0773 | 0773 | 0773 | 0554 | 0663 | 0773 | 0773 | 0773 | 0332 | 0332 | 0668 | 0668 | 0772 | 0559 | 0772 | 0660 | 0664 | 0552 | 0664 | 0663 | 0339 | 0772 | 0339 | females<br>(cont...) |
|   | ANIMAL ID   | 0030 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 |                      |
|   |             | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    | 1    | 2    | 2    | 2    | 2    | 2    |                      |

ALIMENTARY SYSTEM

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Esophagus                                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Cecum                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Colon                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Rectum<br>Metaplasia           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 2 |
| Intestine Small, Duodenum<br>Lymphatic, Ectasia | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 1 |
| Intestine Small, Ileum                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Jejunum<br>Lymphatic, Ectasia  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 2 |
| Liver   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Angiectasis                                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |
| Basophilic Focus                                | X |   | X |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   | X |   | X |
| Clear Cell Focus                                |   |   |   |   | X | X |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |
| Eosinophilic Focus                              | X |   |   | X |   |   |   |   | X |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   |
| Hepatodiaphragmatic Nodule                      |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Mixed Cell Focus                                | X |   | X |   |   |   | X |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Bile Duct, Cyst                                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 4 |   | 2 |   |   |   |   |   |   |   |   |
| Bile Duct, Cyst, Multiple                       |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |
| Mesentery                                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | + |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>150 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | females<br>(cont...) |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|----------------------|
|   | 0611        | 0446 | 0677 | 0777 | 0777 | 0575 | 0667 | 0775 | 0775 | 0773 | 0366 | 0667 | 0755 | 0766 | 0665 | 0566 | 0666 | 0656 | 0663 | 0377 |                      |
| ANIMAL ID   | 0030        | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 |                      |
|   | 1           | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    |                      |

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Oral Mucosa<br>Hyperplasia, Squamous   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Pancreas<br>Artery, Inflammation, Chronic Active                                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  |   |   |   |   |   |   |   | 3 |   |   | 1 |   |   |   |   |   |   |   | 4 |   |   |   |   |   |
| Salivary Glands  | + | + | + | + | + | + | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Stomach, Forestomach<br>Hyperplasia  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  |   |   | 3 |   | 2 |   | 2 |   | 2 |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |
| Stomach, Glandular<br>Erosion<br>Epithelium, Hyperplasia<br>Epithelium, Mineralization | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   | 2 |   |   |

CARDIOVASCULAR SYSTEM

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Blood Vessel<br>Degeneration, Focal<br>Inflammation, Chronic Active<br>Thrombosis | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|   |   |   |   |   |   | 2 |   | 3 |   | 2 |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |
| Heart<br>Cardiomyopathy<br>Pericardium, Inflammation                              | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|   | 1 |   | 2 | 1 |   | 1 | 3 | 3 | 1 |   | 1 | 1 |   |   | 2 | 2 |   |   |   |   |   |   | 1 |   |

ENDOCRINE SYSTEM

|                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Adrenal Cortex | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>150 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | females<br>(cont...) |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|----------------------|
|   | 0611        | 0446 | 0667 | 0777 | 0777 | 0777 | 0556 | 0667 | 0777 | 0556 | 0777 | 0777 | 0333 | 0666 | 0667 | 0557 | 0776 | 0666 | 0556 | 0666 | 0556 | 0666 | 0663 | 0777 |                      |
| ANIMAL ID   | 0030        | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 |                      |
|   | 1           | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    | 1    | 2    | 3    | 4    |                      |

Degeneration, Cystic  
Hyperplasia  
Necrosis  
Thrombosis

|  |  |  |   |   |  |  |   |  |  |   |   |  |   |   |  |  |  |   |   |   |  |  |  |  |
|--|--|--|---|---|--|--|---|--|--|---|---|--|---|---|--|--|--|---|---|---|--|--|--|--|
|  |  |  |   | 2 |  |  | 2 |  |  |   |   |  |   | 2 |  |  |  | 2 | 3 | 3 |  |  |  |  |
|  |  |  | 3 | 3 |  |  | 3 |  |  | 2 | 2 |  | 2 | 1 |  |  |  |   | 2 | 1 |  |  |  |  |

Adrenal Medulla  
Hyperplasia

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
|  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  |   |   |   |   | 1 |   | 2 | 2 |   | 2 |   |   |   |   |   |   |   |   |   | 3 |   |   |   | 1 |

Islets, Pancreatic

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
|  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|

Parathyroid Gland

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
|  | + | + | + | + | + | + | + | + | M | + | + | + | + | + | + | + | M | + | + | + | + | + | + | + |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|

Pituitary Gland  
Pars Distalis, Hyperplasia

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
|  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  | 4 | 2 |   |   | 3 |   |   |   |   |   |   |   |   | 4 | 3 | 4 | 4 | 2 |   | 4 |   |   |   |   |

Thyroid Gland  
C-cell, Hyperplasia  
Follicular Cell, Hyperplasia  
Follicular Cell, Hypertrophy

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
|  | + | + | + | + | + | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  |   |   |   |   |   |   |   |   | 1 |   |   |   |   |   |   |   |   | 4 |   |   |   | 2 | 1 |   |
|  | 2 | 1 |   | 2 |   |   |   | 1 |   |   |   |   |   | 3 |   | 1 |   |   | 3 |   |   | 2 |   | 1 |

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

Clitoral Gland  
Cyst

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
|  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

Ovary  
Atrophy

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
|  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
|  | 1 | 1 | 3 | 2 | 2 |   |   | 1 | 3 | 2 | 1 | 1 |   | 1 | 1 | 1 |   | 1 | 3 | 2 |   |   | 3 | 3 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|
| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>150 mg/kg | DAY ON TEST | 0611 | 0446 | 0661 | 0773 | 0773 | 0773 | 0554 | 0663 | 0773 | 0557 | 0663 | 0773 | 0332 | 0668 | 0668 | 0772 | 0559 | 0772 | 0660 | 0664 | 0552 | 0664 | 0663 | 0339 | 0772 | 0339 |
|   | ANIMAL ID   | 0030 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 |
|   |             | 1    | 2    | 3    | 4    | 5    | 6    | 7    | 8    | 9    | 0    | 1    | 1    | 1    | 1    | 1    | 1    | 1    | 1    | 1    | 1    | 2    | 2    | 2    | 2    | 2    | 2    |

females (cont...)

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Cyst                                    |   |   | 3 | 2 |   |   | 2 | 2 |   |   |   |   |   | 2 |   | 2 |   | 3 | 4 |   |   |   |   |   |   |   |   |
| Inflammation, Acute Necrosis, Fibrinoid |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 4 |   |   |   |   |   |   |   |   |   |   |   |   |
| Uterus                                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Cyst                                    |   |   | 2 |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Dilatation                              |   |   |   |   |   |   |   |   | 4 |   |   |   |   | 3 |   |   |   | 3 |   |   | 4 |   |   |   |   |   |   |
| Inflammation, Acute Thrombosis          |   | 1 |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Endometrium, Hyperplasia, Cystic        | 2 |   | 1 |   | 1 |   |   | 3 | 3 |   | 2 | 2 | 2 | 2 | 1 | 1 |   | 3 |   |   | 1 |   | 2 |   |   | 2 |   |
| Endometrium, Metaplasia, Squamous       | 1 | 3 | 3 |   | 1 |   |   | 3 |   | 3 |   |   |   |   | 2 |   |   |   | 1 |   |   | 3 |   |   |   | 3 |   |

HEMATOPOIETIC SYSTEM

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Bone Marrow                               | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Atrophy                                   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Hyperplasia                               | 1 |   |   |   |   |   |   | 3 |   | 2 |   |   | 3 |   | 2 | 2 |   | 1 | 2 | 3 |   | 3 | 1 | 2 |   |   |   |
| Lymph Node                                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Inguinal, Hyperplasia, Lymphoid           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Lumbar, Infiltration Cellular, Histiocyte |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Mediastinal, Ectasia                      |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |
| Mediastinal, Hemorrhage                   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |
| Lymph Node, Mandibular                    | + | + | + | + | + | + | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Lymph Node, Mesenteric                    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Lymphatic, Ectasia                        |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Spleen                                    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>150 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | ANIMAL ID | females<br>(cont...) |      |      |      |   |  |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|-----------|----------------------|------|------|------|---|--|
|   | 0611        | 0446 | 0677 | 0777 | 0777 | 0575 | 0666 | 0777 | 0575 | 0777 | 0373 | 0666 | 0677 | 0575 | 0777 | 0666 | 0666 | 0575 | 0666 | 0666 |           |                      | 0373 | 0777 |      |   |  |
|   | 1           | 4    | 1    | 3    | 3    | 3    | 4    | 3    | 3    | 1    | 3    | 2    | 2    | 8    | 8    | 2    | 9    | 2    | 0    | 4    | 2         | 4                    | 3    | 9    | 2    |   |  |
|   | 1           | 6    | 5    | 0    | 0    | 0    | 8    | 9    | 0    | 6    | 0    | 9    | 9    | 8    | 8    | 7    | 6    | 9    | 8    | 5    | 6         | 5                    | 1    | 3    | 9    |   |  |
|   | 0030        | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033 | 0033      | 0033                 | 0033 | 0033 | 0033 |   |  |
|   | 0001        | 0002 | 0003 | 0004 | 0005 | 0006 | 0007 | 0008 | 0009 | 0000 | 0001 | 0002 | 0003 | 0004 | 0005 | 0006 | 0007 | 0008 | 0009 | 0000 | 0001      | 0002                 | 0003 | 0004 | 0005 |   |  |
| Hematopoietic Cell Proliferation                  | 3           | 2    | 1    | 3    |      | 2    | 3    | 3    | 2    | 2    | 2    |      | 3    | 2    | 3    | 4    | 2    | 2    | 3    | 2    |           | 3                    | 2    | 3    | 2    |   |  |
| Thymus Atrophy                                    | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +         | +                    | +    | +    | +    |   |  |
| Inflammation                                      | 2           | 2    | 2    |      | 3    | 3    | 3    | 3    | 2    | 2    |      |      | 1    | 1    |      | 3    | 3    | 3    | 3    | 1    | 2         | 2                    |      | 1    | 2    |   |  |
| Epithelial Cell, Hyperplasia                      |             |      |      |      |      |      |      | 2    | 2    |      |      | 2    |      |      |      |      |      |      |      |      |           |                      |      |      |      |   |  |
| <b>INTEGUMENTARY SYSTEM</b>                       |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |           |                      |      |      |      |   |  |
| Mammary Gland Hyperplasia                         | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +         | +                    | +    | +    | +    | + |  |
| Skin  | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +         | +                    | +    | +    | +    | + |  |
| <b>MUSCULOSKELETAL SYSTEM</b>                     |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |           |                      |      |      |      |   |  |
| Bone Fibrous Osteodystrophy                       | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +         | +                    | +    | +    | +    | + |  |
| Skeletal Muscle Degeneration                      |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |           |                      |      |      |      | + |  |
| <b>NERVOUS SYSTEM</b>                             |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |           |                      |      |      |      |   |  |
| Brain   | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +         | +                    | +    | +    | +    | + |  |
| <b>RESPIRATORY SYSTEM</b>                         |             |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |           |                      |      |      |      |   |  |
| Lung Inflammation, Chronic                        | +           | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +    | +         | +                    | +    | +    | +    | + |  |
| Alveolus, Infiltration Cellular, Histiocyte       | 3           | 2    | 2    | 3    | 3    | 3    | 3    |      | 3    | 2    | 3    | 1    | 1    | 2    | 2    | 3    | 1    | 3    | 3    | 3    | 1         | 2                    | 2    |      | +    |   |  |
|   |             |      |      |      |      |      |      |      |      |      |      | 1    |      |      |      |      | 1    |      |      |      |           |                      |      |      | 1    |   |  |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>150 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|
|   | 0730        | 0733  | 0730  | 0732  | 0734  | 0736  | 0736  | 0737  | 0737  | 0735  | 0737  | 0736  | 0731  | 0736  | 0737  | 0737  | 0736  | 0737  | 0731  | 0736  | 0733  | 0736  | 0733  | 0737  |          |
| ANIMAL ID   | 00326       | 00337 | 00338 | 00339 | 00330 | 00330 | 00330 | 00330 | 00330 | 00330 | 00330 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 |          |
|   | 0           | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 50       |

**ALIMENTARY SYSTEM**

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |     |     |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|-----|-----|
| Esophagus                                       | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |     |
| Intestine Large, Cecum                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |     |
| Intestine Large, Colon                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |     |
| Intestine Large, Rectum<br>Metaplasia           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 1   | 2.0 |     |
| Intestine Small, Duodenum<br>Lymphatic, Ectasia | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | A | + | A | +  | 48  | 16  | 1.2 |
| Intestine Small, Ileum                          | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | A | A | +  | 48  |     |     |
| Intestine Small, Jejunum<br>Lymphatic, Ectasia  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | A | A | +  | 48  | 30  | 1.7 |
| Liver   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |     |     |
| Angiectasis                                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2  | 2   | 2.0 |     |
| Basophilic Focus                                |   |   |   |   |   |   | X | X |   |   |   | X | X |   |   |   |   |   |   |   |   |   |   |   | 11 |     |     |     |
| Clear Cell Focus                                | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 4  |     |     |     |
| Eosinophilic Focus                              |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 5  |     |     |     |
| Hepatodiaphragmatic Nodule                      |   |   |   |   |   |   | X |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   | 3  |     |     |     |
| Mixed Cell Focus                                |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 5  |     |     |     |
| Bile Duct, Cyst                                 | 2 |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   | 4  | 2.5 |     |     |
| Bile Duct, Cyst, Multiple                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2  | 2.0 |     |     |
| Mesentery                                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | + |   |   | 2  |     |     |     |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>150 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|
|   | 0730        | 0730  | 0730  | 0732  | 0736  | 0736  | 0736  | 0737  | 0737  | 0735  | 0737  | 0736  | 0731  | 0736  | 0737  | 0737  | 0736  | 0737  | 0731  | 0736  | 0733  | 0736  | 0733  | 0737  |          |
| ANIMAL ID   | 00326       | 00337 | 00338 | 00339 | 00330 | 00330 | 00330 | 00330 | 00330 | 00330 | 00330 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 |          |

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|---|-----|
| Oral Mucosa<br>Hyperplasia, Squamous             | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 1 | 1.0 |
| Pancreas<br>Artery, Inflammation, Chronic Active | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | A | + | 49 | 3 | 2.7 |
| Salivary Glands                                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | M | + | + | + | + | + | 48 |   |     |
| Stomach, Forestomach<br>Hyperplasia              | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 7 | 2.1 |
| Stomach, Glandular<br>Erosion                    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 1 | 3.0 |
| Epithelium, Hyperplasia                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1 | 2.0 |
| Epithelium, Mineralization                       |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1 | 1.0 |

CARDIOVASCULAR SYSTEM

|                                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |     |
|-------------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|-----|
| Blood Vessel<br>Degeneration, Focal | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 1   | 2.0 |
| Inflammation, Chronic Active        |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 4   | 2.5 |
| Thrombosis                          |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    | 1   | 3.0 |
| Heart<br>Cardiomyopathy             | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 24  | 1.8 |
| Pericardium, Inflammation           | 1 | 2 |   | 3 |   |   | 2 | 3 | 3 |   | 2 | 1 | 2 |   | 2 |   |   |   |   |   |   | 1 | 1 |   | 2  | 2.5 |     |

ENDOCRINE SYSTEM

|                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |  |  |
|----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|--|--|
| Adrenal Cortex | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |  |  |
|----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|--|--|

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>150 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |       |        |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|-------|--------|
|   | 0730        | 0733  | 0730  | 0732  | 0736  | 0736  | 0736  | 0737  | 0737  | 0735  | 0737  | 0736  | 0731  | 0736  | 0737  | 0737  | 0736  | 0737  | 0731  | 0736  |          | 0733  | 0736  | 0733   |
| ANIMAL ID   | 00326       | 00337 | 00338 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333 | 00333    | 00333 | 00333 | 00333  |
| Degeneration, Cystic Hyperplasia                  | 1           |       |       |       |       |       |       |       |       |       |       | 3     |       |       | 2     |       | 4     |       |       |       |          | 2     |       |        |
| Necrosis  |             |       |       | 4     | 1     | 1     |       |       |       | 2     |       |       |       |       |       |       | 1     | 1     | 1     |       |          | 1     |       | 3      |
| Thrombosis  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          | 3     |       |        |
| Adrenal Medulla Hyperplasia                       | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | 50     |
| Islets, Pancreatic                                | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | 50     |
| Parathyroid Gland                                 | +           | +     | +     | +     | M     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | M     | +     | +     | +     | +        | +     | +     | 46     |
| Pituitary Gland Pars Distalis, Hyperplasia        | 4           |       |       |       |       | 3     | 3     |       |       |       |       |       | 4     | 2     |       | 2     |       |       | 4     |       | 4        |       |       | 18 3.3 |
| Thyroid Gland C-cell, Hyperplasia                 | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | A     | 48     |
| Follicular Cell, Hyperplasia                      |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       | 6 2.3  |
| Follicular Cell, Hypertrophy                      | 3           | 1     | 1     | 2     | 1     | 1     | 2     | 2     | 2     |       |       | 3     | 1     | 2     |       |       | 1     | 1     |       |       |          |       | 1     | 24 1.7 |

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

|                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |        |
|---------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|---|--------|
| Clitoral Gland Cyst | + | + | + | 3 | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |   |        |
| Ovary Atrophy       | 2 | 3 | 1 |   | 1 | 3 | 2 | 3 | 3 | 2 | 2 |   | 1 | + | 3 | 3 | 3 |   | 2 | + | + | 2 | 2 | 2  | 2 | 50     |
|                     |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   | 37 2.0 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>150 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |               | * TOTALS |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|---------------|----------|
|   | 0730        | 0733  | 0730  | 0732  | 0736  | 0736  | 0736  | 0737  | 0737  | 0735  | 0737  | 0736  | 0731  | 0736  | 0737  | 0737  | 0736  | 0737  | 0731  | 0736  | 0733  | 0736  | 0733  | 0737  |               |          |
| ANIMAL ID   | 00326       | 00337 | 00338 | 00339 | 00340 | 00341 | 00342 | 00343 | 00344 | 00345 | 00346 | 00347 | 00348 | 00349 | 00350 | 00351 | 00352 | 00353 | 00354 | 00355 | 00356 | 00357 | 00358 | 00359 |               |          |
| Hematopoietic Cell Proliferation                  |             |       | 3     |       | 1     | 1     | 2     | 2     | 2     | 3     | 2     | 2     | 3     | 2     | 1     | 1     | 3     |       |       | 3     | 3     |       | 2     | 2     | <b>40 2.3</b> |          |
| Thymus Atrophy                                    | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | M     | <b>49</b>     |          |
| Inflammation                                      | 1           | 2     |       | 2     |       | 2     | 2     | 1     |       | 3     | 4     |       | 1     | 2     |       |       | 2     | 3     |       |       | 3     |       | 2     |       | <b>34 2.2</b> |          |
| Epithelial Cell, Hyperplasia                      |             |       |       |       |       |       |       |       |       |       |       |       |       | 2     |       |       |       |       |       |       |       |       |       |       | <b>3 2.0</b>  |          |
| <b>INTEGUMENTARY SYSTEM</b>                       |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |               |          |
| Mammary Gland Hyperplasia                         | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | <b>50</b>     |          |
|   |             |       |       | 1     |       |       |       |       |       |       |       | 2     |       |       |       |       | 1     |       |       |       |       |       |       |       | <b>7 1.4</b>  |          |
| Skin  | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | <b>50</b>     |          |
| <b>MUSCULOSKELETAL SYSTEM</b>                     |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |               |          |
| Bone Fibrous Osteodystrophy                       | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | <b>50</b>     |          |
|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | <b>1 3.0</b>  |          |
| Skeletal Muscle Degeneration                      |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | <b>1 1.0</b>  |          |
| <b>NERVOUS SYSTEM</b>                             |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |               |          |
| Brain   | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | <b>50</b>     |          |
| <b>RESPIRATORY SYSTEM</b>                         |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |               |          |
| Lung Inflammation, Chronic                        | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | <b>50</b>     |          |
| Alveolus, Infiltration Cellular, Histiocyte       | 2           |       | 3     | 3     |       | 2     | 2     | 2     | 3     |       | 3     |       | 2     | 1     | 3     | 3     |       | 2     |       |       | 3     |       | 1     | 2     | <b>38 2.3</b> |          |
|   |             | 1     |       |       | 1     |       |       |       |       | 2     |       | 2     | 1     | 2     |       |       |       | 3     |       |       |       |       | 2     |       | <b>11 1.5</b> |          |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked





Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |                      |       |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------------------|-------|
| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>300 mg/kg | DAY ON TEST | 0622  | 0175  | 0770  | 0335  | 0779  | 0770  | 0660  | 0779  | 0770  | 0176  | 0779  | 0770  | 0466  | 0677  | 0779  | 0770  | 0661  | 0668  | 0775  | 0779  | 0770  | 0773  | 0779  | 0770  | females<br>(cont...) |       |
|   | ANIMAL ID   | 00351 | 00352 | 00353 | 00354 | 00355 | 00356 | 00357 | 00358 | 00359 | 00360 | 00361 | 00362 | 00363 | 00364 | 00365 | 00366 | 00367 | 00368 | 00369 | 00370 | 00371 | 00372 | 00373 | 00374 |                      | 00375 |
|   |             | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     |                      | 0     |

ALIMENTARY SYSTEM

|                            |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|----------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Esophagus                  | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Perforation                |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Intestine Large, Cecum     | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Colon     | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Large, Rectum    | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Duodenum  | + | + | + | + | + | + | + | + | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + |
| Lymphatic, Ectasia         | 2 | 4 | 1 | 1 | 1 | 2 |   |   | 1 | 1 | 3 |   | 1 |   | 2 |   | 1 | 2 | 2 | 3 | 2 |   | 1 | 2 | 1 |
| Intestine Small, Ileum     | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Intestine Small, Jejunum   | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Lymphatic, Ectasia         | 3 | 3 | 2 | 2 | 2 | 2 | 2 | 3 | 3 | 3 | 4 | 2 | 3 | 3 | 2 | 3 | 2 | 3 | 3 | 3 | 3 | 2 | 3 | 2 | 2 |
| Liver                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Angiectasis                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Basophilic Focus           |   |   | X | X |   | X |   | X |   |   |   |   |   |   | X | X | X | X | X |   | X | X |   |   |   |
| Clear Cell Focus           |   |   |   | X |   |   | X |   | X |   |   |   | X |   |   | X | X | X |   |   | X |   | X | X | X |
| Eosinophilic Focus         |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   | X |   |   |   |   | X |   |   |   |   |
| Hepatodiaphragmatic Nodule |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | X |   |   |   |   |
| Inflammation, Chronic      |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
| Mixed Cell Focus           |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   | X | X |   |   |   | X |   |   |   |   |
| Bile Duct, Cyst            |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |
| Bile Duct, Cyst, Multiple  |   |   |   |   |   |   |   | 2 |   | 3 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked



| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>300 mg/kg | DAY ON TEST |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | females<br>(cont...) |
|---|-------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----------------------|
|   | 0           | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |   |                      |
|   | 6           | 1 | 7 | 7 | 3 | 7 | 7 | 6 | 7 | 7 | 1 | 7 | 7 | 4 | 6 | 7 | 7 | 7 | 7 | 6 | 6 | 7 | 7 | 7 |                      |
| ANIMAL ID   | 2           | 5 | 9 | 0 | 6 | 9 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |   |                      |
|   | 0           | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 | 0 |   |                      |
|   | 3           | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 | 3 |   |                      |
|   | 5           | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 5 | 6 | 6 | 6 | 6 | 6 | 6 | 6 | 6 | 6 | 6 | 6 | 6 | 6 | 6 |   |                      |
|   | 1           | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 0 | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 0 | 1 | 2 | 3 |   |                      |
| Adrenal Cortex                                    | +           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |                      |
| Degeneration, Cystic                              |             |   | 2 |   | 2 |   | 3 |   |   |   |   | 3 | 3 |   |   | 2 |   |   |   |   | 3 | 1 | 2 |   |                      |
| Degeneration, Fatty                               |             |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |                      |
| Hyperplasia                                       | 1           |   | 1 |   |   |   | 2 |   |   | 2 |   |   |   | 1 |   | 2 |   |   |   |   | 4 | 2 | 1 |   |                      |
| Inflammation                                      |             |   |   |   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |                      |
| Necrosis  |             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   |   |   |                      |
| Adrenal Medulla                                   | +           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |                      |
| Hyperplasia                                       |             |   | 1 | 4 |   | 1 | 4 |   | 1 |   |   | 1 |   |   |   | 2 | 1 |   |   |   |   |   | 1 |   |                      |
| Islets, Pancreatic                                | +           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |   |                      |
| Parathyroid Gland                                 | +           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | M | + |   |                      |
| Pituitary Gland                                   | +           | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | M | + | + |   |                      |
| Pars Distalis, Hyperplasia                        |             |   | 3 |   |   | 1 |   | 1 | 2 | 3 |   | 2 |   |   |   | 3 | 1 |   |   |   |   | 1 |   |   |                      |
| Thyroid Gland                                     | +           | + | + | + | + | + | + | + | + | + | + | + | + | A | + | + | + | + | + | + | + | + | + |   |                      |
| C-cell, Hyperplasia                               |             |   | 4 |   |   |   | 4 | 1 |   |   |   | 2 |   |   |   |   |   |   |   |   |   |   |   |   |                      |
| Follicular Cell, Hyperplasia                      |             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |                      |
| Follicular Cell, Hypertrophy                      |             |   | 1 |   | 3 |   |   | 1 | 2 |   | 2 | 2 |   |   | 3 | 2 | 3 | 2 | 1 |   | 2 | 1 | 3 |   |                      |

GENERAL BODY SYSTEM

NONE

GENITAL SYSTEM

|                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |
|----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Clitoral Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + |
| Cyst           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>300 mg/kg | DAY ON TEST           |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       |                       | ANIMAL ID             | females<br>(cont...) |
|---|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|----------------------|
|   | 0<br>6<br>2<br>2      | 0<br>1<br>7<br>5      | 0<br>7<br>2<br>9      | 0<br>7<br>3<br>0      | 0<br>3<br>5<br>6      | 0<br>7<br>2<br>9      | 0<br>7<br>3<br>0      | 0<br>6<br>3<br>0      | 0<br>7<br>2<br>9      | 0<br>7<br>3<br>0      | 0<br>1<br>3<br>0      | 0<br>7<br>3<br>0      | 0<br>7<br>2<br>9      | 0<br>4<br>1<br>6      | 0<br>6<br>9<br>2      | 0<br>7<br>1<br>9      | 0<br>7<br>2<br>9      | 0<br>7<br>3<br>0      | 0<br>6<br>8<br>5      | 0<br>6<br>6<br>9      | 0<br>7<br>2<br>0      | 0<br>7<br>3<br>0      | 0<br>7<br>2<br>9      | 0<br>7<br>3<br>0      |                       |                      |
|   | 0<br>0<br>3<br>5<br>1 | 0<br>0<br>3<br>5<br>2 | 0<br>0<br>3<br>5<br>3 | 0<br>0<br>3<br>5<br>4 | 0<br>0<br>3<br>5<br>5 | 0<br>0<br>3<br>5<br>6 | 0<br>0<br>3<br>5<br>7 | 0<br>0<br>3<br>5<br>8 | 0<br>0<br>3<br>5<br>9 | 0<br>0<br>3<br>5<br>0 | 0<br>0<br>3<br>5<br>1 | 0<br>0<br>3<br>5<br>2 | 0<br>0<br>3<br>5<br>3 | 0<br>0<br>3<br>5<br>4 | 0<br>0<br>3<br>5<br>5 | 0<br>0<br>3<br>5<br>6 | 0<br>0<br>3<br>5<br>7 | 0<br>0<br>3<br>5<br>8 | 0<br>0<br>3<br>5<br>9 | 0<br>0<br>3<br>5<br>0 | 0<br>0<br>3<br>5<br>1 | 0<br>0<br>3<br>5<br>2 | 0<br>0<br>3<br>5<br>3 | 0<br>0<br>3<br>5<br>4 | 0<br>0<br>3<br>5<br>5 |                      |

Inflammation

3

Ovary

Angiectasis

Atrophy

Cyst

Inflammation, Acute

Inflammation, Chronic

Inflammation, Chronic Active

Uterus

Dilatation

Inflammation, Acute

Thrombosis

Endometrium, Hyperplasia, Cystic

Endometrium, Metaplasia, Squamous

Vagina

**HEMATOPOIETIC SYSTEM**

Bone Marrow

Hyperplasia

Lymph Node

Axillary, Hyperplasia, Lymphoid

Iliac, Infiltration Cellular, Histiocyte

Lymph Node, Mandibular

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>300 mg/kg | DAY ON TEST |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      | ANIMAL ID | females<br>(cont...) |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |
|---|-------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|-----------|----------------------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|
|   | 0622        | 0625 | 0627 | 0629 | 0630 | 0632 | 0633 | 0635 | 0636 | 0637 | 0638 | 0639 | 0640 | 0641 | 0642 | 0643 | 0644 | 0645 | 0646 | 0647 | 0648 | 0649 | 0650 | 0651 |           |                      | 0652 | 0653 | 0654 | 0655 | 0656 | 0657 | 0658 | 0659 | 0660 | 0661 | 0662 | 0663 | 0664 | 0665 | 0666 | 0667 | 0668 | 0669 | 0670 | 0671 | 0672 | 0673 | 0674 | 0675 | 0676 | 0677 | 0678 | 0679 | 0680 | 0681 | 0682 | 0683 | 0684 | 0685 | 0686 | 0687 | 0688 | 0689 | 0690 | 0691 | 0692 | 0693 | 0694 | 0695 | 0696 | 0697 | 0698 | 0699 | 0700 | 0701 | 0702 | 0703 | 0704 | 0705 | 0706 | 0707 | 0708 | 0709 | 0710 | 0711 | 0712 | 0713 | 0714 | 0715 | 0716 | 0717 | 0718 | 0719 | 0720 | 0721 | 0722 | 0723 | 0724 | 0725 | 0726 | 0727 | 0728 | 0729 | 0730 | 0731 | 0732 | 0733 | 0734 | 0735 | 0736 | 0737 | 0738 | 0739 | 0740 | 0741 | 0742 | 0743 | 0744 | 0745 | 0746 | 0747 | 0748 | 0749 | 0750 | 0751 | 0752 | 0753 | 0754 | 0755 | 0756 | 0757 | 0758 | 0759 | 0760 | 0761 | 0762 | 0763 | 0764 | 0765 | 0766 | 0767 | 0768 | 0769 | 0770 | 0771 | 0772 | 0773 | 0774 | 0775 | 0776 | 0777 | 0778 | 0779 | 0780 | 0781 | 0782 | 0783 | 0784 | 0785 | 0786 | 0787 | 0788 | 0789 | 0790 | 0791 | 0792 | 0793 | 0794 | 0795 | 0796 | 0797 | 0798 | 0799 | 0800 | 0801 | 0802 | 0803 | 0804 | 0805 | 0806 | 0807 | 0808 | 0809 | 0810 | 0811 | 0812 | 0813 | 0814 | 0815 | 0816 | 0817 | 0818 | 0819 | 0820 | 0821 | 0822 | 0823 | 0824 | 0825 | 0826 | 0827 | 0828 | 0829 | 0830 | 0831 | 0832 | 0833 | 0834 | 0835 | 0836 | 0837 | 0838 | 0839 | 0840 | 0841 | 0842 | 0843 | 0844 | 0845 | 0846 | 0847 | 0848 | 0849 | 0850 | 0851 | 0852 | 0853 | 0854 | 0855 | 0856 | 0857 | 0858 | 0859 | 0860 | 0861 | 0862 | 0863 | 0864 | 0865 | 0866 | 0867 | 0868 | 0869 | 0870 | 0871 | 0872 | 0873 | 0874 | 0875 | 0876 | 0877 | 0878 | 0879 | 0880 | 0881 | 0882 | 0883 | 0884 | 0885 | 0886 | 0887 | 0888 | 0889 | 0890 | 0891 | 0892 | 0893 | 0894 | 0895 | 0896 | 0897 | 0898 | 0899 | 0900 | 0901 | 0902 | 0903 | 0904 | 0905 | 0906 | 0907 | 0908 | 0909 | 0910 | 0911 | 0912 | 0913 | 0914 | 0915 | 0916 | 0917 | 0918 | 0919 | 0920 | 0921 | 0922 | 0923 | 0924 | 0925 | 0926 | 0927 | 0928 | 0929 | 0930 | 0931 | 0932 | 0933 | 0934 | 0935 | 0936 | 0937 | 0938 | 0939 | 0940 | 0941 | 0942 | 0943 | 0944 | 0945 | 0946 | 0947 | 0948 | 0949 | 0950 | 0951 | 0952 | 0953 | 0954 | 0955 | 0956 | 0957 | 0958 | 0959 | 0960 | 0961 | 0962 | 0963 | 0964 | 0965 | 0966 | 0967 | 0968 | 0969 | 0970 | 0971 | 0972 | 0973 | 0974 | 0975 | 0976 | 0977 | 0978 | 0979 | 0980 | 0981 | 0982 | 0983 | 0984 | 0985 | 0986 | 0987 | 0988 | 0989 | 0990 | 0991 | 0992 | 0993 | 0994 | 0995 | 0996 | 0997 | 0998 | 0999 | 1000 | 1001 | 1002 | 1003 | 1004 | 1005 | 1006 | 1007 | 1008 | 1009 | 1010 | 1011 | 1012 | 1013 | 1014 | 1015 | 1016 | 1017 | 1018 | 1019 | 1020 | 1021 | 1022 | 1023 | 1024 | 1025 | 1026 | 1027 | 1028 | 1029 | 1030 | 1031 | 1032 | 1033 | 1034 | 1035 | 1036 | 1037 | 1038 | 1039 | 1040 | 1041 | 1042 | 1043 | 1044 | 1045 | 1046 | 1047 | 1048 | 1049 | 1050 | 1051 | 1052 | 1053 | 1054 | 1055 | 1056 | 1057 | 1058 | 1059 | 1060 | 1061 | 1062 | 1063 | 1064 | 1065 | 1066 | 1067 | 1068 | 1069 | 1070 | 1071 | 1072 | 1073 | 1074 | 1075 | 1076 | 1077 | 1078 | 1079 | 1080 | 1081 | 1082 | 1083 | 1084 | 1085 | 1086 | 1087 | 1088 | 1089 | 1090 | 1091 | 1092 | 1093 | 1094 | 1095 | 1096 | 1097 | 1098 | 1099 | 1100 | 1101 | 1102 | 1103 | 1104 | 1105 | 1106 | 1107 | 1108 | 1109 | 1110 | 1111 | 1112 | 1113 | 1114 | 1115 | 1116 | 1117 | 1118 | 1119 | 1120 | 1121 | 1122 | 1123 | 1124 | 1125 | 1126 | 1127 | 1128 | 1129 | 1130 | 1131 | 1132 | 1133 | 1134 | 1135 | 1136 | 1137 | 1138 | 1139 | 1140 | 1141 | 1142 | 1143 | 1144 | 1145 | 1146 | 1147 | 1148 | 1149 | 1150 | 1151 | 1152 | 1153 | 1154 | 1155 | 1156 | 1157 | 1158 | 1159 | 1160 | 1161 | 1162 | 1163 | 1164 | 1165 | 1166 | 1167 | 1168 | 1169 | 1170 | 1171 | 1172 | 1173 | 1174 | 1175 | 1176 | 1177 | 1178 | 1179 | 1180 | 1181 | 1182 | 1183 | 1184 | 1185 | 1186 | 1187 | 1188 | 1189 | 1190 | 1191 | 1192 | 1193 | 1194 | 1195 | 1196 | 1197 | 1198 | 1199 | 1200 | 1201 | 1202 | 1203 | 1204 | 1205 | 1206 | 1207 | 1208 | 1209 | 1210 | 1211 | 1212 | 1213 | 1214 | 1215 | 1216 | 1217 | 1218 | 1219 | 1220 | 1221 | 1222 | 1223 | 1224 | 1225 | 1226 | 1227 | 1228 | 1229 | 1230 | 1231 | 1232 | 1233 | 1234 | 1235 | 1236 | 1237 | 1238 | 1239 | 1240 | 1241 | 1242 | 1243 | 1244 | 1245 | 1246 | 1247 | 1248 | 1249 | 1250 | 1251 | 1252 | 1253 | 1254 | 1255 | 1256 | 1257 | 1258 | 1259 | 1260 | 1261 | 1262 | 1263 | 1264 | 1265 | 1266 | 1267 | 1268 | 1269 | 1270 | 1271 | 1272 | 1273 | 1274 | 1275 | 1276 | 1277 | 1278 | 1279 | 1280 | 1281 | 1282 | 1283 | 1284 | 1285 | 1286 | 1287 | 1288 | 1289 | 1290 | 1291 | 1292 | 1293 | 1294 | 1295 | 1296 | 1297 | 1298 | 1299 | 1300 | 1301 | 1302 | 1303 | 1304 | 1305 | 1306 | 1307 | 1308 | 1309 | 1310 | 1311 | 1312 | 1313 | 1314 | 1315 | 1316 | 1317 | 1318 | 1319 | 1320 | 1321 | 1322 | 1323 | 1324 | 1325 | 1326 | 1327 | 1328 | 1329 | 1330 | 1331 | 1332 | 1333 | 1334 | 1335 | 1336 | 1337 | 1338 | 1339 | 1340 | 1341 | 1342 | 1343 | 1344 | 1345 | 1346 | 1347 | 1348 | 1349 | 1350 | 1351 | 1352 | 1353 | 1354 | 1355 | 1356 | 1357 | 1358 | 1359 | 1360 | 1361 | 1362 | 1363 | 1364 | 1365 | 1366 | 1367 | 1368 | 1369 | 1370 | 1371 | 1372 | 1373 | 1374 | 1375 | 1376 | 1377 | 1378 | 1379 | 1380 | 1381 | 1382 | 1383 | 1384 | 1385 | 1386 | 1387 | 1388 | 1389 | 1390 | 1391 | 1392 | 1393 | 1394 | 1395 | 1396 | 1397 | 1398 | 1399 | 1400 | 1401 | 1402 | 1403 | 1404 | 1405 | 1406 | 1407 | 1408 | 1409 | 1410 | 1411 | 1412 | 1413 | 1414 | 1415 | 1416 | 1417 | 1418 | 1419 | 1420 | 1421 | 1422 | 1423 | 1424 | 1425 | 1426 | 1427 | 1428 | 1429 | 1430 | 1431 | 1432 | 1433 | 1434 | 1435 | 1436 | 1437 | 1438 | 1439 | 1440 | 1441 | 1442 | 1443 | 1444 | 1445 | 1446 | 1447 | 1448 | 1449 | 1450 | 1451 | 1452 | 1453 | 1454 | 1455 | 1456 | 1457 | 1458 | 1459 | 1460 | 1461 | 1462 | 1463 | 1464 | 1465 | 1466 | 1467 | 1468 | 1469 | 1470 | 1471 | 1472 | 1473 | 1474 | 1475 | 1476 | 1477 | 1478 | 1479 | 1480 | 1481 | 1482 | 1483 | 1484 | 1485 | 1486 | 1487 | 1488 | 1489 | 1490 | 1491 | 1492 | 1493 | 1494 | 1495 | 1496 | 1497 | 1498 | 1499 | 1500 | 1501 | 1502 | 1503 | 1504 | 1505 | 1506 | 1507 | 1508 | 1509 | 1510 | 1511 | 1512 | 1513 | 1514 | 1515 | 1516 | 1517 | 1518 | 1519 | 1520 | 1521 | 1522 | 1523 | 1524 | 1525 | 1526 | 1527 | 1528 | 1529 | 1530 | 1531 | 1532 | 1533 | 1534 | 1535 | 1536 | 1537 | 1538 | 1539 | 1540 | 1541 | 1542 | 1543 | 1544 | 1545 | 1546 | 1547 | 1548 | 1549 | 1550 | 1551 | 1552 | 1553 | 1554 | 1555 | 1556 | 1557 | 1558 | 1559 | 1560 | 1561 | 1562 | 1563 | 1564 | 1565 | 1566 | 1567 | 1568 | 1569 | 1570 | 1571 | 1572 | 1573 | 1574 | 1575 | 1576 | 1577 | 1578 | 1579 | 1580 | 1581 | 1582 | 1583 | 1584 | 1585 | 1586 | 1587 | 1588 | 1589 | 1590 | 1591 | 1592 | 1593 | 1594 | 1595 | 1596 | 1597 | 1598 | 1599 | 1600 | 1601 | 1602 | 1603 | 1604 | 1605 | 1606 | 1607 | 1608 | 1609 | 1610 | 1611 | 1612 | 1613 | 1614 | 1615 | 1616 | 1617 | 1618 | 1619 | 1620 | 1621 | 1622 | 1623 | 1624 | 1625 | 1626 | 1627 | 1628 | 1629 | 1630 | 1631 | 1632 | 1633 | 1634 | 1635 | 1636 | 1637 | 1638 | 1639 | 1640 | 1641 | 1642 | 1643 | 1644 | 1645 | 1646 | 1647 | 1648 | 1649 | 1650 | 1651 | 1652 | 1653 | 1654 | 1655 | 1656 | 1657 | 1658 | 1659 | 1660 | 1661 | 1662 | 1663 | 1664 | 1665 | 1666 | 1667 | 1668 | 1669 | 1670 | 1671 | 1672 | 1673 | 1674 | 1675 | 1676 | 1677 | 1678 | 1679 | 1680 | 1681 | 1682 | 1683 | 1684 | 1685 | 1686 | 1687 | 1688 | 1689 | 1690 | 1691 | 1692 | 1693 | 1694 | 1695 | 1696 | 1697 | 1698 | 1699 | 1700 | 1701 | 1702 | 1703 | 1704 | 1705 | 1706 | 1707 | 1708 | 1709 | 1710 | 1711 | 1712 | 1713 | 1714 | 1715 | 1716 | 1717 | 1718 | 1719 | 1720 | 1721 | 1722 | 1723 | 1724 | 1725 | 1726 | 1727 | 1728 | 1729 | 1730 | 1731 | 1732 | 1733 | 1734 | 1735 | 1736 | 1737 | 1738 | 1739 | 1740 | 1741 | 1742 | 1743 | 1744 | 1745 | 1746 | 1747 | 1748 | 1749 | 1750 | 1751 | 1752 | 1753 | 1754 | 1755 | 1756 | 1757 | 1758 | 1759 | 1760 | 1761 | 1762 | 1763 | 1764 | 1765 | 1766 | 1767 | 1768 | 1769 | 1770 | 1771 | 1772 | 1773 | 1774 | 1775 | 1776 | 1777 | 1778 | 1779 | 1780 | 1781 | 1782 | 1783 | 1784 | 1785 | 1786 | 1787 | 1788 | 1789 | 1790 | 1791 | 1792 | 1793 | 1794 | 1795 | 1796 | 1797 | 1798 | 1799 | 1800 | 1801 | 1802 | 1803 | 1804 | 1805 | 1806 | 1807 | 1808 | 1809 | 1810 | 1811 | 1812 | 1813 | 1814 | 1815 | 1816 | 1817 | 1818 | 1819 | 1820 | 1821 | 1822 | 1823 | 1824 | 1825 | 1826 | 1827 | 1828 | 1829 | 1830 | 1831 | 1832 | 1833 | 1834 | 1835 | 1836 | 1837 | 1838 | 1839 | 1840 | 1841 | 1842 | 1843 | 1844 | 1845 | 1846 | 1847 | 1848 | 1849 | 1850 | 1851 | 1852 | 1853 | 1854 | 1855 | 1856 | 1857 | 1858 | 1859 | 1860 | 1861 | 1862 | 1863 | 1864 | 1865 | 1866 | 1867 | 1868 | 1869 | 1870 | 1871 | 1872 | 1873 | 1874 | 1875 | 1876 | 1877 | 1878 | 1879 | 1880 | 1881 | 1882 | 1883 | 1884 | 1885 | 1886 | 1887 | 1888 | 1889 | 1890 | 1891 | 1892 | 1893 | 1894 | 1895 | 1896 | 1897 | 1898 | 1899 | 1900 | 1901 | 1902 | 1903 | 1904 | 1905 | 1906 | 1907 | 1908 | 1909 | 1910 | 1911 | 1912 | 1913 | 1914 | 1915 | 1916 | 1917 | 1918 | 1919 | 1920 | 1921 | 1922 | 1923 | 1924 | 1925 | 1926 | 1927 | 1928 | 1929 | 1930 | 1931 | 1932 | 1933 | 1934 |



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

|  |             |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |    |
|--|-------------|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|
| <b>HARLAN SPRAGUE DAWLEY RATS</b><br><b>FEMALE</b><br><b>300 mg/kg</b> | DAY ON TEST | 06 | 01 | 07 | 07 | 03 | 07 | 07 | 06 | 07 | 07 | 01 | 07 | 07 | 04 | 06 | 07 | 07 | 07 | 06 | 06 | 07 | 07 | 07 | 07 | 07 |
|  | ANIMAL ID   | 02 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 | 00 |
|  |             | 22 | 05 | 09 | 00 | 06 | 09 | 00 | 00 | 09 | 00 | 06 | 00 | 00 | 00 | 02 | 09 | 09 | 00 | 01 | 08 | 05 | 02 | 03 | 02 | 03 |

females  
(cont...)

Urinary Bladder

+ +

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>300 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |       |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|-------|
|   | 0197        | 0390  | 0592  | 0738  | 0174  | 0770  | 0773  | 0777  | 0563  | 0779  | 0779  | 0675  | 0779  | 0571  | 0779  | 0770  | 0777  | 0672  | 0674  | 0779  | 0675  |          | 0779  | 0770  |
| ANIMAL ID   | 00376       | 00377 | 00378 | 00379 | 00380 | 00381 | 00382 | 00383 | 00384 | 00385 | 00386 | 00387 | 00388 | 00389 | 00390 | 00391 | 00392 | 00393 | 00394 | 00395 | 00396 | 00397    | 00398 | 00399 |
|   | 0           | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0        | 0     | 0     |
|   | 0           | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0     | 0        | 0     | 0     |
|   | 3           | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3     | 3        | 3     | 4     |
|   | 7           | 7     | 7     | 7     | 8     | 8     | 8     | 8     | 8     | 8     | 8     | 8     | 8     | 8     | 9     | 9     | 9     | 9     | 9     | 9     | 9     | 9        | 9     | 0     |
|   | 6           | 7     | 8     | 9     | 0     | 1     | 2     | 3     | 4     | 5     | 6     | 7     | 8     | 9     | 0     | 1     | 2     | 3     | 4     | 5     | 6     | 7        | 8     | 0     |

**ALIMENTARY SYSTEM**

|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |        |        |
|--|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|--------|--------|
| Esophagus Perforation                        | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50     |        |
|  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1      |        |
| Intestine Large, Cecum                       | M | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 48     |        |
| Intestine Large, Colon                       | M | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 48     |        |
| Intestine Large, Rectum                      | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50     |        |
| Intestine Small, Duodenum Lymphatic, Ectasia | M | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 47     |        |
|  |   | 1 | 1 | 2 |   | 1 | 1 | 1 | 2 | 1 | 1 |   | 3 | 1 | 1 | 3 | 1 | 1 |   | 1 | 1 |   | 1 | 1 | 38 1.5 |        |
| Intestine Small, Ileum                       | M | + | + | + | M | + | + | + | A | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 47     |        |
| Intestine Small, Jejunum Lymphatic, Ectasia  | M | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 48     |        |
|  |   | 3 | 3 | 3 |   | 2 | 2 | 2 | 3 | 3 | 1 | 2 | 3 | 1 | 2 | 3 | 2 | 2 |   | 2 | 3 | 3 | 2 | 1 | 3      | 47 2.5 |
| Liver  | M | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 48     |        |
| Angiectasis                                  |   | 1 |   |   |   |   |   |   |   |   | 2 |   |   |   | 2 |   |   |   |   |   |   |   |   |   | 3 1.7  |        |
| Basophilic Focus                             |   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   | X | X |   |   |   |   |   | 14     |        |
| Clear Cell Focus                             |   | X |   |   |   | X | X |   | X |   | X |   | X | X |   |   |   |   | X |   |   |   |   |   | 18     |        |
| Eosinophilic Focus                           |   |   |   |   |   | X |   |   |   |   |   |   |   | X |   |   |   |   |   |   | X |   |   |   | 6      |        |
| Hepatodiaphragmatic Nodule                   |   |   | X |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2      |        |
| Inflammation, Chronic                        |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 1 2.0  |        |
| Mixed Cell Focus                             |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 4      |        |
| Bile Duct, Cyst                              |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 |   |   | 2 | 3 |   |   |   |   |   |   | 4 2.5  |        |
| Bile Duct, Cyst, Multiple                    |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 2 2.5  |        |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked



Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>300 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |   |   |   |    |     |     |     |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|---|---|---|----|-----|-----|-----|
|   | 0197        | 0390  | 0592  | 0730  | 0834  | 0730  | 0770  | 0777  | 0533  | 0763  | 0779  | 0675  | 0779  | 0571  | 0729  | 0733  | 0724  | 0674  | 0667  | 0729  | 0645  | 0725  | 0779  | 0770  |          |   |   |   |    |     |     |     |
| ANIMAL ID   | 00376       | 00377 | 00378 | 00379 | 00380 | 00381 | 00382 | 00383 | 00384 | 00385 | 00386 | 00387 | 00388 | 00389 | 00390 | 00391 | 00392 | 00393 | 00394 | 00395 | 00396 | 00397 | 00398 | 00399 |          |   |   |   |    |     |     |     |
| Mesentery   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          | + | 1 |   |    |     |     |     |
| Oral Mucosa<br>Hyperplasia, Squamous              | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | + | + | + | +  | 50  | 2   | 2.0 |
| Pancreas<br>Acinus, Hyperplasia                   | M           | +     | +     | +     | M     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | + | + | + | 48 | 1   | 1.0 |     |
| Artery, Inflammation, Chronic Active              |             | 1     |       |       |       |       |       |       |       |       |       |       | 4     |       |       |       |       |       |       |       |       |       |       |       |          |   | 1 | 3 | 6  | 2.2 |     |     |
| Salivary Glands                                   | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | + | + | + | 50 |     |     |     |
| Stomach, Forestomach<br>Hyperplasia               | +           | +     | +     | +     | M     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | + | + | + | 49 | 3   | 2.3 |     |
| Inflammation                                      |             |       |       |       |       |       |       |       |       |       |       |       | 2     |       |       |       |       |       |       |       |       |       |       |       |          |   |   |   |    | 1   | 3.0 |     |
| Stomach, Glandular                                | +           | +     | +     | +     | M     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | + | + | + | 49 |     |     |     |
| Tongue<br>Cyst                                    |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |   | + |   | 1  | 1   | 3.0 |     |
|   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |   |   |   |    |     |     |     |
| <b>CARDIOVASCULAR SYSTEM</b>                      |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |   |   |   |    |     |     |     |
| Blood Vessel<br>Inflammation, Chronic Active      | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | + | + | + | +  | 50  | 7   | 1.9 |
| Heart<br>Cardiomyopathy                           | +           | +     | +     | +     | M     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | + | + | + | 49 | 24  | 1.4 |     |
| Epicardium, Inflammation                          |             | 1     |       |       |       |       | 1     | 1     |       |       |       |       | 2     | 2     | 2     | 1     | 1     | 1     |       |       |       |       |       |       |          |   |   |   |    | 1   | 1   | 1   |
|   | 3           |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |   |   |   |    |     |     |     |
| <b>ENDOCRINE SYSTEM</b>                           |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |   |   |   |    |     |     |     |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>300 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |       |       |       |       |     |     |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-------|-------|-------|-------|-----|-----|
|   | 0197        | 0390  | 0592  | 0774  | 0918  | 1170  | 1377  | 1573  | 1756  | 1972  | 2177  | 2376  | 2577  | 2777  | 2977  | 3177  | 3377  | 3577  | 3777  | 3977  |          |       |       |       |       |     |     |
| ANIMAL ID   | 00376       | 00377 | 00378 | 00379 | 00380 | 00381 | 00382 | 00383 | 00384 | 00385 | 00386 | 00387 | 00388 | 00389 | 00390 | 00391 | 00392 | 00393 | 00394 | 00395 | 00396    | 00397 | 00398 | 00399 | 00400 |     |     |
| Adrenal Cortex                                    | M           | +     | +     | +     | M     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 48    |     |     |
| Degeneration, Cystic                              |             | 3     |       |       |       | 2     | 3     |       |       |       |       |       |       | 1     |       | 2     |       | 3     |       |       |          |       |       |       | 15    | 2.3 |     |
| Degeneration, Fatty                               |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       | 1     | 2.0 |     |
| Hyperplasia                                       |             | 3     |       |       |       |       |       |       | 1     | 1     |       | 3     |       |       |       |       | 4     |       | 1     |       |          |       |       |       | 15    | 1.9 |     |
| Inflammation                                      |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       | 1     | 1.0 |     |
| Necrosis  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |       |       |       | 1     | 3.0 |     |
| Adrenal Medulla                                   | M           | +     | +     | +     | M     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 48    |     |     |
| Hyperplasia                                       |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1     | 2     |       |       |       |          |       |       |       | 1     | 12  | 1.7 |
| Islets, Pancreatic                                | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 50    |     |     |
| Parathyroid Gland                                 | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 49    |     |     |
| Pituitary Gland                                   | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 49    |     |     |
| Pars Distalis, Hyperplasia                        |             | 2     | 1     | 1     |       | 1     |       | 4     | 1     | 1     |       | 1     | 2     | 4     |       | 2     |       |       | 2     | 1     |          | 3     |       | 4     | 24    | 2.0 |     |
| Thyroid Gland                                     | +           | +     | A     | +     | A     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | +     | +     | +     | 47    |     |     |
| C-cell, Hyperplasia                               |             |       |       |       |       |       |       |       |       |       |       | 2     |       |       |       |       |       |       |       |       |          |       |       |       | 5     | 2.6 |     |
| Follicular Cell, Hyperplasia                      |             |       |       |       |       |       |       |       |       |       |       | 3     |       |       |       |       |       |       |       |       |          |       |       |       | 1     | 3.0 |     |
| Follicular Cell, Hypertrophy                      |             |       |       | 2     |       | 1     | 1     | 2     |       |       |       |       |       | 2     | 3     | 4     | 2     | 1     | 3     | 3     | 2        |       |       | 3     | 1     | 30  | 2.0 |

**GENERAL BODY SYSTEM**

NONE

**GENITAL SYSTEM**

|                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |     |
|----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|-----|
| Clitoral Gland | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |     |
| Cyst           |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 |   |   |   | 3 | 3 |   |   |   | 3 | 4  | 3.0 |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade

+ .. Tissue examined microscopically

X .. Lesion present

I .. Insufficient tissue

M .. Missing tissue

A .. Autolysis precludes evaluation

BLANK .. Not examined microscopically

1-4 .. Lesion qualified as:

1) Minimal 3) Moderate

2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

**P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL**

Indole-3-carbinol  
CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>300 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |     |     |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|-----|-----|
|   | 0197        | 0390  | 0592  | 0730  | 0834  | 0700  | 0770  | 0773  | 0563  | 0729  | 0775  | 0679  | 0770  | 0571  | 0729  | 0733  | 0249  | 0664  | 0677  | 0724  | 0665  | 0729  | 0777  | 0770  |          |     |     |
| ANIMAL ID   | 00376       | 00377 | 00378 | 00379 | 00380 | 00381 | 00382 | 00383 | 00384 | 00385 | 00386 | 00387 | 00388 | 00389 | 00390 | 00391 | 00392 | 00393 | 00394 | 00395 | 00396 | 00397 | 00398 | 00399 |          |     |     |
| Inflammation                                      |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 3        | 2   | 3.0 |
| Ovary   | +           | +     | +     | +     | M     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +        | 49  |     |
| Angiectasis                                       |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          | 1   | 3.0 |
| Atrophy   |             |       |       | 3     |       |       |       |       | 2     |       | 1     | 2     |       | 1     | 3     |       |       | 1     | 1     | 3     | 1     | 2     | 2     | 2     | 2        | 30  | 1.9 |
| Cyst  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 2     |       | 2     | 1     | 2     |       |       |       | 2     | 16       | 2.3 |     |
| Inflammation, Acute                               |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1        | 2.0 |     |
| Inflammation, Chronic                             |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1        | 2.0 |     |
| Inflammation, Chronic Active                      |             |       |       |       |       |       |       |       | 1     |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1        | 1.0 |     |
| Uterus  | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | 50       |     |     |
| Dilatation  |             |       | 4     |       |       |       |       |       | 4     |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 5        | 2.8 |     |
| Inflammation, Acute                               |             |       | 2     |       |       |       |       |       | 2     |       | 1     |       |       | 2     |       |       | 2     |       | 1     |       | 2     |       |       | 2     | 9        | 1.8 |     |
| Thrombosis  |             |       | 3     |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1        | 3.0 |     |
| Endometrium, Hyperplasia, Cystic                  |             |       |       |       |       |       |       | 3     |       | 2     | 1     |       | 1     | 3     |       |       | 2     | 1     |       | 2     |       | 2     | 3     | 1     | 21       | 1.9 |     |
| Endometrium, Metaplasia, Squamous                 |             |       | 2     |       |       |       |       |       |       |       |       |       |       | 2     |       |       | 2     | 2     | 1     |       |       |       |       | 1     | 11       | 1.8 |     |
| Vagina  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 2        |     |     |
| <b>HEMATOPOIETIC SYSTEM</b>                       |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |          |     |     |
| Bone Marrow                                       | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | 50       |     |     |
| Hyperplasia                                       | 1           |       | 2     | 1     |       |       | 2     |       | 1     |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1     | 17       | 1.9 |     |
| Lymph Node  |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 3        |     |     |
| Axillary, Hyperplasia, Lymphoid                   |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1        | 3.0 |     |
| Iliac, Infiltration Cellular, Histiocyte          |             |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | 1        | 3.0 |     |
| Lymph Node, Mandibular                            | +           | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | +     | 50       |     |     |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
 + .. Tissue examined microscopically  
 X .. Lesion present  
 I .. Insufficient tissue  
 M .. Missing tissue  
 A .. Autolysis precludes evaluation  
 BLANK .. Not examined microscopically  
 1-4 .. Lesion qualified as:  
 1) Minimal 3) Moderate  
 2) Mild 4) Marked

Experiment Number: 20006 - 03

Test Type: CHRONIC

Route: GAVAGE

Species/Strain: RATS/HSD

P09: NON-NEOPLASTIC LESIONS BY INDIVIDUAL ANIMAL

Indole-3-carbinol

CAS Number: 700-06-1

Date Report Requested: 04/16/2013

Time Report Requested: 09:53:55

First Dose M/F: 03/14/07 / 03/15/07

Lab: BAT

| HARLAN SPRAGUE DAWLEY RATS<br>FEMALE<br>300 mg/kg | DAY ON TEST |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       |       | * TOTALS |
|---|-------------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|----------|
|   | 01970       | 03902 | 05930 | 07714 | 07738 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 | 07733 |          |
| ANIMAL ID   | 00376       | 00377 | 00378 | 00379 | 00380 | 00381 | 00382 | 00383 | 00384 | 00385 | 00386 | 00387 | 00388 | 00389 | 00390 | 00391 | 00392 | 00393 | 00394 | 00395 | 00396 | 00397 | 00398 | 00399 | 00400    |

|                                   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |     |
|-----------------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|----|-----|
| Lymph Node, Mesenteric Hemorrhage | M | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 48 | 1  | 3.0 |
| Lymphatic, Ectasia                |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   | 3 | 2 |   |   | 1 | 3 | 1 |   |    | 15 | 1.7 |

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |     |  |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|----|-----|--|
| Spleen Hematopoietic Cell Proliferation | M | + | + | + | M | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 48 | 33 | 2.2 |  |
|   |   |   | 3 |   |   | 2 | 2 | 3 | 1 | 1 | 2 |   | 2 |   | 2 |   | 1 | 2 | 2 | 1 | 3 |   | 3 | 3 |   |    |    |     |  |

|                           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |    |     |  |
|---------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|----|-----|--|
| Thymus Atrophy Hemorrhage | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 38 | 2.3 |  |
|                           | 1 |   | 2 |   |   | 2 | 3 | 1 | 4 | 2 | 4 |   |   | 2 | 3 | 1 | 3 |   |   | 2 |   | 2 | 3 | 2 | 3 |    |    |     |  |

INTEGUMENTARY SYSTEM

|                           |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |  |
|---------------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|---|-----|--|
| Mammary Gland Hyperplasia | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 7 | 1.4 |  |
|                           |   |   |   |   |   | 2 |   |   |   |   |   |   |   |   |   | 1 | 1 |   |   |   |   |   |   |   |   |    |   |     |  |

|   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |  |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|---|-----|--|
| Skin Cyst Epithelial Inclusion Fibrosis | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 1 | 1.0 |  |
|   | 1 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |  |

MUSCULOSKELETAL SYSTEM

|                 |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |  |  |  |
|-----------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|--|--|--|
| Bone            | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 |  |  |  |
| Skeletal Muscle |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |  |  |  |

NERVOUS SYSTEM

|                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |  |
|------------------|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|----|---|-----|--|
| Brain Hemorrhage | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | + | 50 | 1 | 2.0 |  |
|                  |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |   |    |   |     |  |

\* .. Total animals with tissue examined microscopically; Total animals with lesion and mean severity grade  
+ .. Tissue examined microscopically  
X .. Lesion present  
I .. Insufficient tissue  
M .. Missing tissue  
A .. Autolysis precludes evaluation  
BLANK .. Not examined microscopically  
1-4 .. Lesion qualified as:  
1) Minimal 3) Moderate  
2) Mild 4) Marked



