

**Experiment Number:** 99031 - 01  
**Test Type:** 90-DAY  
**Route:** GAVAGE  
**Species/Strain:** RATS/F 344/N

**P03: INCIDENCE RATES OF NON-NEOPLASTIC LESIONS BY ANATOMIC SITE(a)**

Ginkgo biloba extract  
**CAS Number:** 90045-36-6

**Date Report Requested:** 09/12/2016  
**Time Report Requested:** 13:16:44  
**First Dose M/F:** 02/09/04 / 02/10/04  
**Lab:** BAT

**NTP Study Number:** C99031  
**Lock Date:** 10/07/2004  
**Cage Range:** ALL  
**Date Range:** ALL  
**Reasons For Removal:** ALL  
**Removal Date Range:** ALL  
**Treatment Groups:** Include ALL  
**Study Gender:** Both  
**TDMSE Version:** 3.0.2.3\_002  
**PWG Approval Date:** NONE

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FISCHER 344 RATS MALE	0 MG/KG	62.5 MG/KG	125 MG/KG	250 MG/KG	500 MG/KG	1000 MG/KG
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**Disposition Summary**

<b>Animals Initially In Study</b>	<b>10</b>	<b>10</b>	<b>10</b>	<b>10</b>	<b>10</b>	<b>10</b>
<b>Early Deaths</b>						
<b>Survivors</b>						
<b>Terminal Sacrifice</b>	<b>10</b>	<b>10</b>	<b>10</b>	<b>10</b>	<b>10</b>	<b>10</b>
<b>Animals Examined Microscopically</b>	<b>10</b>	<b>10</b>	<b>10</b>	<b>10</b>	<b>10</b>	<b>10</b>

## ALIMENTARY SYSTEM

Esophagus	(10)	(0)	(0)	(0)	(0)	(10)
Intestine Large, Cecum	(10)	(0)	(0)	(0)	(0)	(10)
Intestine Large, Colon	(10)	(0)	(0)	(0)	(0)	(10)
Intestine Large, Rectum	(10)	(0)	(0)	(0)	(0)	(10)
Parasite Metazoan	1 (10%)					
Intestine Small, Duodenum	(10)	(0)	(0)	(0)	(0)	(10)
Intestine Small, Ileum	(10)	(0)	(0)	(0)	(0)	(10)
Intestine Small, Jejunum	(10)	(0)	(0)	(0)	(0)	(10)
Liver	(10)	(10)	(10)	(10)	(10)	(10)
Hepatodiaphragmatic Nodule	1 (10%)					1 (10%)
Inflammation, Chronic	5 (50%)	6 (60%)	8 (80%)	9 (90%)	9 (90%)	6 (60%)
Necrosis				1 (10%)		
Bile Duct, Hyperplasia						1 (10%)
Hepatocyte, Fatty Change		10 (100%)	10 (100%)	10 (100%)	10 (100%)	10 (100%)
Hepatocyte, Hypertrophy		10 (100%)	10 (100%)	10 (100%)	10 (100%)	10 (100%)
Pancreas	(10)	(0)	(0)	(0)	(0)	(10)
Infiltration Cellular, Lymphocyte	3 (30%)					
Acinus, Atrophy	1 (10%)					
Salivary Glands	(10)	(0)	(0)	(0)	(0)	(10)
Stomach, Forestomach	(10)	(0)	(0)	(0)	(0)	(10)
Stomach, Glandular	(10)	(0)	(0)	(0)	(0)	(10)
Inflammation, Chronic	1 (10%)					1 (10%)

## CARDIOVASCULAR SYSTEM

a - Number of animals examined microscopically at site and number of animals with lesion

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FISCHER 344 RATS MALE	0 MG/KG	62.5 MG/KG	125 MG/KG	250 MG/KG	500 MG/KG	1000 MG/KG
Blood Vessel	(10)	(0)	(0)	(0)	(0)	(10)
Heart	(10)	(0)	(0)	(0)	(0)	(10)
Cardiomyopathy	10 (100%)					7 (70%)
<b>ENDOCRINE SYSTEM</b>						
Adrenal Cortex	(10)	(10)	(10)	(10)	(10)	(10)
Vacuolization Cytoplasmic	10 (100%)	10 (100%)	10 (100%)	10 (100%)	10 (100%)	10 (100%)
Adrenal Medulla	(10)	(0)	(0)	(0)	(0)	(10)
Islets, Pancreatic	(10)	(0)	(0)	(0)	(0)	(10)
Parathyroid Gland	(8)	(0)	(0)	(0)	(0)	(10)
Pituitary Gland	(10)	(0)	(0)	(0)	(0)	(10)
Thyroid Gland	(10)	(10)	(10)	(10)	(10)	(10)
Follicular Cell, Hypertrophy		2 (20%)		3 (30%)	10 (100%)	10 (100%)
<b>GENERAL BODY SYSTEM</b>						
None						
<b>GENITAL SYSTEM</b>						
Epididymis	(10)	(0)	(0)	(0)	(0)	(10)
Preputial Gland	(10)	(0)	(0)	(0)	(0)	(10)
Prostate	(10)	(0)	(0)	(0)	(0)	(10)
Seminal Vesicle	(10)	(0)	(0)	(0)	(0)	(10)
Testes	(10)	(0)	(0)	(0)	(0)	(10)
<b>HEMATOPOIETIC SYSTEM</b>						
Bone Marrow	(10)	(0)	(0)	(0)	(0)	(10)
Lymph Node, Mesenteric	(10)	(0)	(0)	(0)	(0)	(10)
Spleen	(10)	(0)	(0)	(0)	(0)	(10)
Thymus	(10)	(0)	(0)	(0)	(0)	(10)

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FISCHER 344 RATS MALE	0 MG/KG	62.5 MG/KG	125 MG/KG	250 MG/KG	500 MG/KG	1000 MG/KG
<b>INTEGUMENTARY SYSTEM</b>						
Mammary Gland	(10)	(0)	(0)	(0)	(0)	(10)
Skin	(10)	(0)	(0)	(0)	(0)	(10)
<b>MUSCULOSKELETAL SYSTEM</b>						
Bone	(10)	(0)	(0)	(0)	(0)	(10)
<b>NERVOUS SYSTEM</b>						
Brain	(10)	(0)	(0)	(0)	(0)	(10)
<b>RESPIRATORY SYSTEM</b>						
Lung	(10)	(0)	(0)	(0)	(0)	(10)
Metaplasia, Osseous	1 (10%)					1 (10%)
Alveolar Epithelium, Hyperplasia, Focal	5 (50%)					1 (10%)
Alveolus, Infiltration Cellular, Histiocyte, Focal	6 (60%)					2 (20%)
Interstitialium, Inflammation						1 (10%)
Nose	(10)	(10)	(10)	(10)	(10)	(10)
Foreign Body		1 (10%)		1 (10%)		
Inflammation, Acute	1 (10%)					
Inflammation, Chronic		1 (10%)				1 (10%)
Inflammation, Chronic Active				1 (10%)		
Goblet Cell, Hyperplasia		1 (10%)	1 (10%)			
Goblet Cell, Respiratory Epithelium, Hyperplasia		1 (10%)		1 (10%)	2 (20%)	
Olfactory Epithelium, Metaplasia, Respiratory	1 (10%)				1 (10%)	
Olfactory Epithelium, Pigmentation					5 (50%)	7 (70%)
Respiratory Epithelium, Hyperplasia		1 (10%)	1 (10%)			
Transitional Epithelium, Hyperplasia				1 (10%)		
Trachea	(10)	(0)	(0)	(0)	(0)	(10)

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FISCHER 344 RATS MALE	0 MG/KG	62.5 MG/KG	125 MG/KG	250 MG/KG	500 MG/KG	1000 MG/KG
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SPECIAL SENSES SYSTEM						
Eye	(10)	(0)	(0)	(0)	(0)	(10)
Harderian Gland	(10)	(0)	(0)	(0)	(0)	(10)
Infiltration Cellular, Lymphocyte	1 (10%)					
<hr/>						
URINARY SYSTEM						
Kidney	(10)	(10)	(10)	(10)	(10)	(10)
Mineralization	5 (50%)					4 (40%)
Nephropathy	7 (70%)	7 (70%)	7 (70%)	6 (60%)	6 (60%)	8 (80%)
Renal Tubule, Accumulation, Hyaline Droplet			1 (10%)			
Urinary Bladder	(10)	(0)	(0)	(0)	(0)	(10)

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

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FISCHER 344 RATS FEMALE	0 MG/KG	62.5 MG/KG	125 MG/KG	250 MG/KG	500 MG/KG	1000 MG/KG
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**Disposition Summary**

Animals Initially In Study	10	10	10	10	10	10
Early Deaths						
Survivors						
Terminal Sacrifice	10	10	10	10	10	10
Animals Examined Microscopically	10	10	10	10	10	10

## ALIMENTARY SYSTEM

Esophagus	(10)	(0)	(0)	(0)	(0)	(10)
Muscularis, Inflammation, Chronic						2 (20%)
Intestine Large, Cecum	(10)	(0)	(0)	(0)	(0)	(10)
Intestine Large, Colon	(10)	(0)	(0)	(0)	(0)	(10)
Intestine Large, Rectum	(10)	(0)	(0)	(0)	(0)	(10)
Intestine Small, Duodenum	(10)	(0)	(0)	(0)	(0)	(10)
Intestine Small, Ileum	(10)	(0)	(0)	(0)	(0)	(10)
Intestine Small, Jejunum	(10)	(0)	(0)	(0)	(0)	(10)
Liver	(10)	(10)	(10)	(10)	(10)	(10)
Hepatodiaphragmatic Nodule	1 (10%)	1 (10%)		1 (10%)	1 (10%)	
Inflammation, Chronic	5 (50%)	6 (60%)	7 (70%)	5 (50%)	8 (80%)	6 (60%)
Hepatocyte, Hypertrophy		1 (10%)			9 (90%)	10 (100%)
Pancreas	(10)	(0)	(0)	(0)	(0)	(10)
Infiltration Cellular, Lymphocyte	2 (20%)					1 (10%)
Inflammation, Chronic	1 (10%)					
Salivary Glands	(10)	(0)	(0)	(0)	(0)	(10)
Stomach, Forestomach	(10)	(0)	(0)	(0)	(0)	(10)
Stomach, Glandular	(10)	(0)	(0)	(0)	(0)	(10)

## CARDIOVASCULAR SYSTEM

Blood Vessel	(10)	(0)	(0)	(0)	(0)	(10)
Heart	(10)	(0)	(0)	(0)	(0)	(10)
Cardiomyopathy	3 (30%)					6 (60%)

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<b>ENDOCRINE SYSTEM</b>						
Adrenal Cortex	(10)	(0)	(0)	(0)	(0)	(10)
Adrenal Medulla	(10)	(0)	(0)	(0)	(0)	(10)
Islets, Pancreatic	(10)	(0)	(0)	(0)	(0)	(10)
Parathyroid Gland	(10)	(0)	(0)	(0)	(0)	(9)
Pituitary Gland	(10)	(0)	(0)	(0)	(0)	(10)
Thyroid Gland	(10)	(10)	(10)	(10)	(10)	(10)
Cyst	1 (10%)					
Ectopic Thymus	2 (20%)					
Follicular Cell, Hypertrophy					3 (30%)	5 (50%)
<b>GENERAL BODY SYSTEM</b>						
None						
<b>GENITAL SYSTEM</b>						
Clitoral Gland	(10)	(0)	(0)	(0)	(0)	(10)
Ovary	(10)	(0)	(0)	(0)	(0)	(10)
Uterus	(10)	(0)	(0)	(0)	(0)	(10)
Endometrium, Hyperplasia, Cystic	2 (20%)					1 (10%)
<b>HEMATOPOIETIC SYSTEM</b>						
Bone Marrow	(10)	(0)	(0)	(0)	(0)	(10)
Lymph Node, Mesenteric	(10)	(0)	(0)	(0)	(0)	(10)
Spleen	(10)	(0)	(0)	(0)	(0)	(10)
Thymus	(10)	(0)	(0)	(0)	(0)	(10)
<b>INTEGUMENTARY SYSTEM</b>						
Mammary Gland	(10)	(0)	(0)	(0)	(0)	(10)

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Skin	(10)	(0)	(0)	(0)	(0)	(10)
<b>MUSCULOSKELETAL SYSTEM</b>						
Bone	(10)	(0)	(0)	(0)	(0)	(10)
<b>NERVOUS SYSTEM</b>						
Brain	(10)	(0)	(0)	(0)	(0)	(10)
<b>RESPIRATORY SYSTEM</b>						
Lung	(10)	(0)	(0)	(0)	(0)	(10)
Infiltration Cellular, Histiocyte, Focal						1 (10%)
Metaplasia, Osseous	1 (10%)					
Pigmentation, Hemosiderin	1 (10%)					1 (10%)
Alveolar Epithelium, Hyperplasia, Focal	1 (10%)					3 (30%)
Alveolus, Infiltration Cellular, Histiocyte, Focal	3 (30%)					2 (20%)
Nose	(10)	(10)	(10)	(10)	(10)	(10)
Foreign Body	2 (20%)					
Inflammation, Chronic	2 (20%)					1 (10%)
Inflammation, Chronic Active			1 (10%)		1 (10%)	2 (20%)
Glands, Goblet Cell, Hyperplasia						1 (10%)
Olfactory Epithelium, Atrophy			1 (10%)		3 (30%)	3 (30%)
Olfactory Epithelium, Metaplasia, Respiratory	1 (10%)	1 (10%)				
Olfactory Epithelium, Pigmentation			5 (50%)	5 (50%)	9 (90%)	7 (70%)
Respiratory Epithelium, Hyperplasia	2 (20%)		1 (10%)			
Transitional Epithelium, Hyperplasia	1 (10%)				1 (10%)	1 (10%)
Trachea	(10)	(0)	(0)	(0)	(0)	(10)
<b>SPECIAL SENSES SYSTEM</b>						
Eye	(10)	(0)	(0)	(0)	(0)	(10)

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FISCHER 344 RATS FEMALE	0 MG/KG	62.5 MG/KG	125 MG/KG	250 MG/KG	500 MG/KG	1000 MG/KG
Harderian Gland	(10)	(0)	(0)	(0)	(0)	(10)
Infiltration Cellular, Lymphocyte						1 (10%)
<hr/>						
URINARY SYSTEM						
Kidney	(10)	(0)	(0)	(0)	(0)	(10)
Mineralization	6 (60%)					5 (50%)
Nephropathy	1 (10%)					2 (20%)
Urinary Bladder	(10)	(0)	(0)	(0)	(0)	(10)

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\*\*\* END OF REPORT \*\*\*

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