

実験計画

群	20週				匹数			
	Tg	雄 野生型	Tg	雌 野生型				
1	4NQO	5.5% "DAG"	16	16	15	15	=62	
2	4NQO	2.75% "DAG"	16	16	15	15	=62	
3	4NQO	1.375% "DAG"	16	16	15	15	=62	
4	4NQO	5.5% TAG	16	16	15	15	=62	
5	Water	5.5% "DAG"	16	16	15	15	=62	
6	Water	5.5% TAG	16	16	15	15	=62	
		解剖 雄 Tg	解剖 雄 Tg, 野生型 雌 野生型	計372匹				

ラット:Hras-128, Tg 及び野生型
 4NQO:10ppm 飲水投与
 "DAG"、TAG:基礎食に混餌投与

図1. 実験プロトコール

舌：上皮過形成

(Hyperplasia)



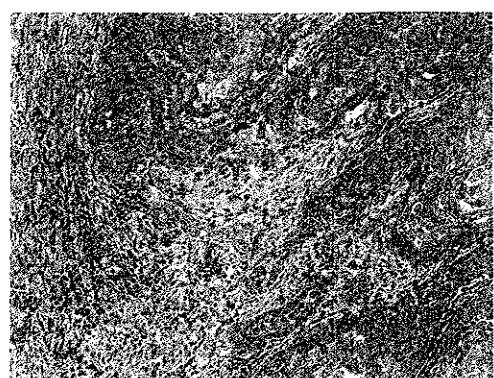
舌：乳頭腫

(Papilloma)



図2. 4NQO+5.5% "DAG"投与群 (Tgラット雄)

舌：扁平上皮がん



(Squamous cell

carcinoma)

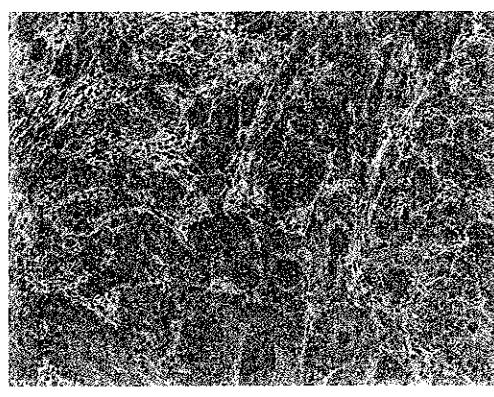
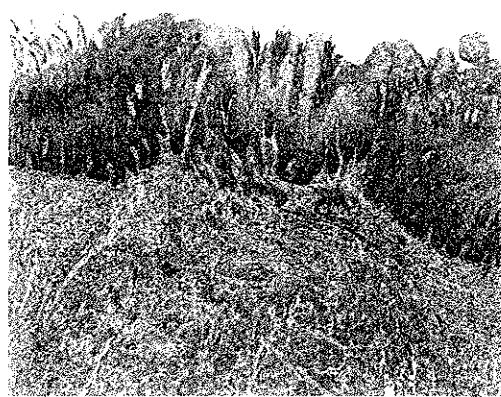


図3. 4NQO+5.5% "DAG"投与群 (Tgラット雄)

研究成果の刊行に関する一覧表

書籍

著者氏名	論文タイトル名	書籍全体の 編集者名	書籍名	出版社名	出版地	出版年	ページ
飯郷正明	転移モデル	國元武彦、 長繩博	生物薬科 学実験講 座13	廣川書店	東京	2003	pp205-217

雑誌

発表者氏名	論文タイトル名	発表誌名	巻号	ページ	出版年
Nobuko Shindo-Okada and Masaaki Iigo	Expression of the Arp11 gene suppresses the tumorigenicity of PC-14 human lung adenocarcinoma cells	Biochem. Biophysic. Res. Commun.	312	889-896	2003
Masaaki Iigo, Mariko Shimamura, Eiji Matsuda, Ken-ichi Fujita, Hiroshi Nomoto, Jun Satoh, Syuji Kojima, David B. Alexander, Malcolm A. Moore and Hiroyuki Tsuda	Orally administered bovine lactoferrin induces caspase-1 and interleukin-18 in the mouse intestinal mucosa: a possible explanation for inhibition of carcinogenesis and metastasis	Cytokine	25 (1)	36-44	2004
Mariko Shimamura, Yukio Yamamoto, Hiromi Ashino, Tsutomu Oikawa, Tadahiko Hazato, Hiroyuki Tsuda, and Masaaki Iigo.	Bovine lactoferrin inhibits tumor-induced angiogenesis	Int. J. Cancer	111	111-116	2004

Tetsuyuki Takahashi, Nobuo Takasuka, <u>Masaaki Iigo</u> , David B. Alexander, Masaki Baba, Hoyoku Nishino, Hiroyuki Tsuda, and Toru Okuyama.	Isoliquiritigenin, a flavonoid from licorice, reduces prostaglandin E2 and nitric oxide, causes poptosis, and suppresses aberrant crypt foci development.	Cancer Science	95	448-453	2004
Ken-ichi Fujita, Eiji Matsuda, Kazunori Sekine, <u>Masaaki</u> <u>Iigo</u> , and Hiroyuki Tsuda	Lactoferrin modifies apoptosis-related gene expression in the colon of the azoxymethane-treated rat.	Cancer Lett.	213	21-29	2004
Hiroshi Nomoto, <u>Masaaki Iigo</u> , Hiroki Hamada, Shuji Kojima, and Hiroyuki Tsuda	Chemoprevention of colorectal cancer by grape seed proanthocyanidin is accompanied by a decrease in proliferation and increase in apoptosis.	Nutr. & Cancer	49	81-88	2004
Ken-ichi Fujita, Eiji Matsuda, Kazunori Sekine, <u>Masaaki</u> <u>Iigo</u> and Hiroyuki Tsuda	Lactoferrin enhances Fas expression and apoptosis in the colon mucosa of azoxymethane-treated rats.	Carcinogenesis	25	1961-1966	2004

Hiroyuki Tsuda, Y. Ohshima, Hiroshi Nomoto., Ken- ichi Fujita, Eiji Matsuda, <u>Masaaki Jigo</u> , Nobuo Takasuka and Malcolm A Moore	Cancer prevention by natural compounds	Drug Metab. Pharmacokinet	19	245-263	2004
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