## FY '06 Apiary Inspection Report Illinois Department of Agriculture (July 1, 2005 through June 30, 2006)

The Apiary Inspection Section of the Illinois Department of Agriculture administers the Illinois Bees and Apiaries Act. The Department's Apiary Inspectors examine honeybee colonies around the state for the issuance of moving permits, to monitor the health of the bee population, to prevent the spread of diseases and pests of the honeybee, and to provide advice on general honeybee management.

Beekeeping in Illinois continues to be a hobbyist endeavor with almost 98% of the beekeepers managing 10 colonies or less (Table 1). Only 19 beekeepers maintain 100 or more colonies.

Beekeepers are to be registered with the Department of Agriculture. As of the end of fiscal year 2006, 1264 beekeepers were managing 27,671 colonies in 2157 apiaries in Illinois (Table 2). The number of registered beekeepers has increased as compared to the past year. 51 new beekeepers were registered during the fiscal year. Table 3 lists the number of colonies and apiaries registered in each county in Illinois. Peoria County had the highest number of colonies with 2089. Jo Daviess County was a close second with 2014 colonies.

Colony inspection statistics for this fiscal year and several previous years are presented in Table 4. From July 1, 2004, through June 30, 2005, 346 apiaries containing 2673 colonies were visited. Of these colonies, 1939 were actually opened and inspected. American Foulbrood Disease (AFB) was detected in 36 colonies, or 1.9% of the colonies actually opened. This shows a decrease in the number of colonies infected with AFB as compared to 2005. In accordance with the Act, these diseased colonies were destroyed. There also was a definite decrease in the number of colonies infected with European Foulbrood and Chalkbrood as compared to FY '05.

Varroa mites continue to be found throughout the state. Inspection reports during the fiscal year indicated a significant increase in varroa mite levels as compared to the last two years. This may be due in part to the randomness of inspections, the time of year that inspections were made, environmental conditions and possible resistance to chemicals for varroa mite treatment.

Reports from around the state indicated that colony losses following the winter were light in some areas and moderate in other areas. Also, interest in colonies for pollination continues to increase due to the lack of feral colonies and the realization of the importance of honeybee pollination.

Tracheal mites are not listed as a regulated parasite in the Bees and Apiaries Act and rules. Examinations for tracheal mites can still be performed when requested. No tracheal mites were discovered in conjunction with department apiary inspections for FY '04.

A newer pest of honeybees, the small hive beetle (*Aethina tumida*), was discovered in several states in the southeastern United States in 1998. Unfortunately, the pest was found in Kankakee, McLean and Will Counties during 2001. During FY '02 there was no confirmation of small hive beetle spreading to other counties. However, small hive beetles were found in isolated locations in Bureau, Henry and Whiteside Counties in FY '03. No cases of small hive beetle have been reported or confirmed outside of those six counties since FY '03. The Department continues to closely monitor the movement of the small hive beetle as of July 1, 2005. The Department requested and was initially granted a Section 18 exemption under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA) for the use of coumaphos impregnated plastic strips to treat small hive beetles and varroa mites during 2000. This exemption has been renewed annually, including 2005. Varroa mites have demonstrated resistance to fluvalinate in some parts of the U.S. so another control product, such as coumaphos, is needed.

TABLE 1

Distribution of Beekeeper Size in Illinois as of July 1, 2006

Number of Colonies	Number of Beekeepers	Percentage of Beekeepers		
0	86	6.8		
1-5	804	64.0		
6-10	179	14.3		
11-20	92	7.3		
21-50	54	4.3		
51-100	22	1.8		
101-200	13	1.0		
201-300	1	.08		
301-400	1	.08		
401-500	1	.08		
>500	3	.2		
TOTAL	1256	100.0*		

<sup>\*</sup> May not total 100% due to rounding.

TABLE 2

Illinois Beekeeper and Colony Statistics from 1988 through 2006 as of July 1 of each year.

Year	Number of Registered Beekeepers	Number of Apiaries	Number of Colonies	Colonies/ Beekeeper	Colonies/ Apiary
2006	1264	2157	20,217	16.0	9.4
2005	1,213	2,054	27,646	22.8	13.5
2004	1,141	1,940	19,572	17.2	10.1
2003	1,117	1,926	18,649	16.7	9.7
2002	1,107	1,914	17,963	16.3	9.4
2001	1,160	2,038	19,627	16.9	9.6
2000	1,142	1,975	18,504	16.2	9.4
1999	1,208	2,025	16,939	14.0	8.4
1998	1,295	2,136	18,129	14.0	8.5
1997	1,521	2,464	17,276	11.4	7.0
1996	1,515	2,506	16,896	11.2	6.7
1995	1,782	2,879	19,037	10.7	6.6
1994	1,999	3,252	21,872	10.9	6.7
1993	2,021	3,350	24,240	12.0	7.2
1992	2,249	3,668	26,405	11.7	7.2
1991	2,329	3,758	27,693	11.9	7.4
1990	2,705	4,336	33,800	12.5	7.8
1989	2,783	4,413	34,966	12.6	7.9
1988	2,966	4,649	37,025	12.5	8.0

TABLE 3 Number of Registered Apiaries and Colonies in Illinois Counties as of July 1, 2006

	# OF	# <b>OF</b>		# OF	# <b>OF</b>
COUNTY	APIARIES	COLONIES	COUNTY	APIARIES	COLONIES
Adams	35	249	Jefferson	11	35
Alexander	1	6	Jersey	12	56
Bond	7	23	JoDaviess	79	2014
Boone	15	330	Johnson	7	62
Brown	24	165	Kane	77	364
Bureau	21	113	Kankakee	17	180
Calhoun	4	14	Kendall	25	113
Carroll	28	440	Knox	18	230
Cass	11	92	LaSalle	28	145
Champaign	58	193	Lake	70	357
Christian	12	26	Lawrence	4	10
Clark	11	39	Lee	10	36
Clay	4	17	Livingston	15	42
Clinton	20	29	Logan	20	211
Coles	26	145	Macon	19	39
Cook	99	568	Macoupin	38	151
Crawford	9	21	Madison	48	296
Cumberland	11	23	Marion	10	22
DeKalb	15	56	Marshall	8	59
DeWitt	10	20	Mason	14	84
Douglas	21	79	Massac	2	400
DuPage	63	230	McDonough	17	80
Edgar	22	126	McHenry	58	648
Edwards	6	22	McLean	36	141
Effingham	11	43	Menard	16	75
Fayette	17	78	Mercer	4	32
Ford	11	30	Monroe	17	274
Franklin	9	26	Montgomery	9	39
Fulton	42	231	Morgan	14	129
Gallatin	3	38	Moultrie	14	67
Greene	3	10	Ogle	29	234
Grundy	23	209	Peoria	54	2089
Hamilton	5	15	Perry	19	165
Hancock	24	274	Piatt	12	76
Hardin	0	0	Pike	27	120
Henderson	7	45	Pope	0	0
Henry	8	29	Pulaski	4	540
Iroquois	12	815	Putnam	3	16
Jackson	16	152	Randolph	12	82
Jasper	12	29	Richland	11	24

TABLE 3 cont.

Number of Registered Apiaries and Colonies in Illinois Counties as of July 1, 2005

	# <b>OF</b>	# <b>OF</b>
COUNTY	APIARIES	COLONIES
Rock Island	8	28
Saline	3	10
Sangamon	102	359
Schuyler	16	83
Scott	6	8
Shelby	11	57
St. Clair	53	208
Stark	4	10
Stephenson	29	285
Tazewell	41	388
Union	13	1504
Vermilion	28	222
Wabash	2	19
Warren	11	145
Washington	13	51
Wayne	26	108
White	2	7
Whiteside	24	107
Will	50	728
Williamson	32	866
Winnebago	40	150
Woodford	19	77

TABLE 4

Illinois Apiary Inspection Statistics -- 1990 through July 1, 2006

Year	# of Apiaries Inspected	Colonies in Apiaries Inspected	# of Colonies Opened	A # of Colonies	FB % of Colonies Opened	# of Colonies with EFB	# of Colonies w/ Chalk Brood	Vari	oa Mites % of Colonies Inspected	# of Colonies Tracheal Mites
FY06	346	2673	1939	36	1.9	2	17	18.2	6.8	-
FY 05	296	4,695	2,603	50	1.9	10	69	171	3.6	-
FY 04	219	4,696	1,747	37	2.1	1	48	54	1.1	-
FY 03	266	3,662	1,915	89	4.7	8	109	297	8.1	8
FY02	196	1,999	1,254	31	2.5	0	4	141	7.0	-
FY01	231	3,228	1,273	18	1.4	1	41	217	6.7	-
FY00	115	1,731	855	21	2.4	0	4	407	23.5	9
FY99	156	4,083	1,424	8	0.6	0	19	751	18.4	
FY98	199	3,027	1,388	85	6.1	0	51	1,232	40.7	5
FY97	277	2,086	1,236	32	2.6	2	7	99	4.7	-
FY96	279	2,480	1,349	156	11.8	5	54	260	11.3	-
FY95	333	2,584	1,363	15	1.1	3	6	837	32.4	88
FY94	530	3,809	2,357	72	3.1	8	33	1,090	28.6	121
FY93	419	2,366	1,530	48	3.1	6	10	672	28.4	144
FY92	460	-	2,173	62	2.8	19	25	389	-	119
Cal92	474	-	1,916	72	3.7	1	21	618	-	120
Cal91	459	2,944	2,437	64	2.6	3	9	392	-	286
Cal90	400	-	-	140	-	11	108	-	-	-

AFB = American Foulbrood Disease EFB = European Foulbrood Disease