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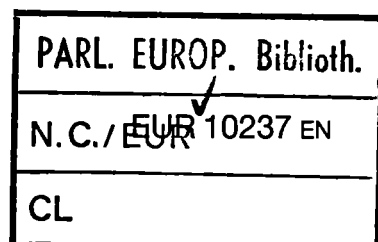
Blue tongue in the Mediterranean region

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SEROLOGICAL DATA ON BLUETONGUE IN MOROCCO - PRELIMINARY RESULTS

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ABSTRACT

A serological survey on sheep and goats for BT antibodies in Morocco shows that BT exists mainly in the south-west areas of the country. Around 3 per cent of the sheep and 7 per cent of the goats are infected.

Sera of sheep and goats were collected during the 1983-84 winter in different areas of Morocco. The Agar gel test was performed and the results noted: -, +; ++; +++. (Lefevre and Taylor, 1983)

The results are presented in Tables 1 and 2.

Table 1 shows that most of the infected animals come from the Agadir area (south-west of the country). The positive ones from Rabat have no special signification since they come from a state farm and the animals were bought specially in the Agadir area where sheep and goat raising is important.

Table 2 shows that animals of each age group are equally infected. This would rather be an argument for an epidemic pattern of the disease than for an endemic one (in this case, the percentage of infected animals would be increasing with the age).

The existence of bluetongue in Morocco has already been recognized. In October 1956 Placidi described a clinical outbreak in cross-bred Merinos in the northern part of the country (Placidi, 1956).

Culicoides midges are present all the year round in the south, but only in summer and autumn in the north (the average winter temperature at Rabat is 7°C; it is colder in the mountains of Chefchaouen, Taza and Azrou).

To support the theory of a windborne introduction of bluetongue to Portugal (in June and July 1956), we have to suppose that under certain weather conditions the disease can spread in Morocco from south to north and then to Europe.

As Sellers et al., (1978) stated, the dominating winds in summer and autumn are not favourable (from north-west to south-east, or west to east); in 1956 the midges could have been taken from Morocco to Portugal only on

the 21st of June and then during a three hour period only.

In conclusion we can say that although the introduction of the disease from Morocco to Europe is possible, it is not very likely.

TABLE 1 Results of the serological survey for bluetongue antibodies in Morocco

Area	Annual rainfall (mm)	Altitude (m)	Sheep		Goats	
			No tested	per cent positive	No tested	per cent positive
Chefchaouen	800-1000	500-1000	64	0	100	0
Taza	600-800	500-1000	107	0	31	3.2
Rabat	400-600	<500	6	(3/6)	31	3.2
Azrou	600-800	1000-1500	128	0.8	66	3
Agadir	300-400	500-1000	52	13.5	111	22.5
Ouarzazate	300-400	700-800	23	0	60	0
Totals			380	3	399	7.2

TABLE 2 Age distribution of bluetongue AGD positive animals in the Agadir area of Morocco.

Age	Sheep			Goats		
	No.	+	-	No.	+	-
0 - 1	3	1	2	16	0	16
1 - 2	12	1	11	14	2	12
2 - 3	11	2	9	23	6	17
3 - 4	5	1	4	13	2	11
4 - 5	11	1	10	18	6	12
5 and over	10	1	9	27	9	18

REFERENCES

- Lefevre, P.C. and Taylor, W.P. 1983. *Revue Elev. Méd. vét. Pays trop.* 36, 241-245.
 Placidi, L. 1957. *Bull. Acad. vét. Fr.* 30, 79-84.
 Sellers, R.F., Pedgley, D.E. and Tucker, M.R. 1978. *J. Hyg., Camb.* 81, 189-196.