DEWS	DRY EYE: DIAGNOSTIC TEST TEMPLATE	
22112		
RAPPORTEUR	A.J.Bron	16 <sup>th</sup> Oct 2004
TEST	Meibography	Mathers
ТО	Meibomian gland morphology and density and drop out.	REFERENCES
DIAGNOSE	Diagnosis of Meibomian gland dysfunction (MGD)	
VERSION of	[V1]	Mathers and
TEST		Billborough 1992
DESCRIPTION	Meiboscopy is the visualization of the meibomian gland by	
	transillumination of the eyelid. Meibography implies	
	photographic documentation	
NATURE of	Various studies	Mathers and
STUDY		Billborough 1992
CONDUCT of	Film Photography: Trans-cutaneous infrared photography,	Jester et al. 1991;
TEST	as in cited papers.	Mathers et al.
	Quantification of the number of whole or partial glands	1991 (MGD
	missing in the central two thirds of each lower eyelid.	blepharitis)
	In the GPC study, the result from the two eyes was averaged.	
	Images can be read by a masked observer.	
	Quantification: central 10 glands of each lower lid assessed.	Mathers et al. 1991
	Videophotography:	Mathers et al. 1994
RESULTS of STUDY	Various studies	
Web Video	Not available	
Standardization	Time of day [] Temperature [] Humidity [] Air	
	speed [] Illumination [] Insensitive to these factors.	
Diagnostic	Employed in Accutane study: Pre- Accutane treatment the	Mathers et al.
value	meibography score was 1.0; There was a significant fall post	1991 (Accutane
	treatment, to $2.5 \pm 1.2$ (p< 0.005).	study.
Repeatability	Intra-observer agreement. [ - ]	
	Inter-observer agreement. [ - ]	
Sensitivity	(true positives) [ - ]	
Specificity	(100 – false positives) [ - ]	
Glossary	MGD = Meibomian gland dysfunction	

## **References:**

Mathers WD, Shields WJ, et al. (1991). Meibomian gland morphology and tear osmolarity changes with Accutane therapy. *Cornea* 10:286-290.

Mathers W, Shields W, et al. (1991). Meibomian gland dysfunction in chronic blepharitis. *Cornea* 10:277-285.

Mathers WD, Billborough M (1992). Meibomian gland function and giant papillary conjunctivitis. *Am J Ophthalmol* 114:188-192.

Mathers, W. D., T. Daley, et al. (1994). "Video imaging of the meibomian gland." <u>Arch Ophthalmol</u> **112**(4): 448-9.