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Table 4

Natural Thermoluminescence (NTL) Data for Antarctic Meteorites

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The measurement and data reduction methods were described by Hasan *et al.* (1987, *Proc. 17th LPSC*, E703-E709; 1989, *LPSC XX*, 383-384). For meteorites whose TL lies between 5 and 100 krad, the natural TL is related primarily to terrestrial history. Samples with NTL <5 krad have TL levels below that which can reasonably be ascribed to long terrestrial ages. Such meteorites have had their TL lowered by heating within the last million years or so by close solar passage, shock heating, or atmospheric entry, exacerbated in the case of some achondrites by anomalous fading.

Sample	Class	Natural TL [krad at 250 °C]
ALH 97101	H5	0.7 ± 0.1
ALH 97102	H5	39.4 ± 0.3
GRA 98186	H6	39.8 ± 0.5
SCO 98200	L4	3.5 ± 0.1
ALH 97100	L6	22.5 ± 0.1
LEW 97204	L6	12.4 ± 0.1
LEW 97205	L6	11.6 ± 0.1
LEW 97207	L6	9.7 ± 0.1
LEW 97210	L6	12.3 ± 0.1
LEW 97212	L6	9 ± 1
SCO 98201	L6	6.9 ± 0.2
LEW 97213	LL5	5.5 ± 0.1
QUE 97805	LL5	0.4 ± 0.1
QUE 97807	LL5	4.0 ± 0.1
QUE 97811	LL5	17.0 ± 0.1
QUE 97840	LL5	3.2 ± 0.1
LEW 97203	LL6	7.6 ± 0.1
LEW 97206	LL6	4.9 ± 0.1

COMMENTS: The following comments are based on natural TL data, TL sensitivity, the shape of the induced TL glow curve, classifications, and JSC and Arkansas sample descriptions.

LEW 97207 (L6) has very low TL sensitivity and may be highly shocked.

Pairings suggested by TL data:
L6: LEW 97205, LEW 97210, and LEW 97212 with LEW 97204.
LL5: QUE97805 with QUE97070 (AMN 22:2)
LL5: QUE 97807 and QUE 97840 with the QUE 97016 group (AMN 22:2).
LL6: LEW 97206 with LEW 97203.