

Time current curves Power Defense MCCB frame 1 thermal-magnetic

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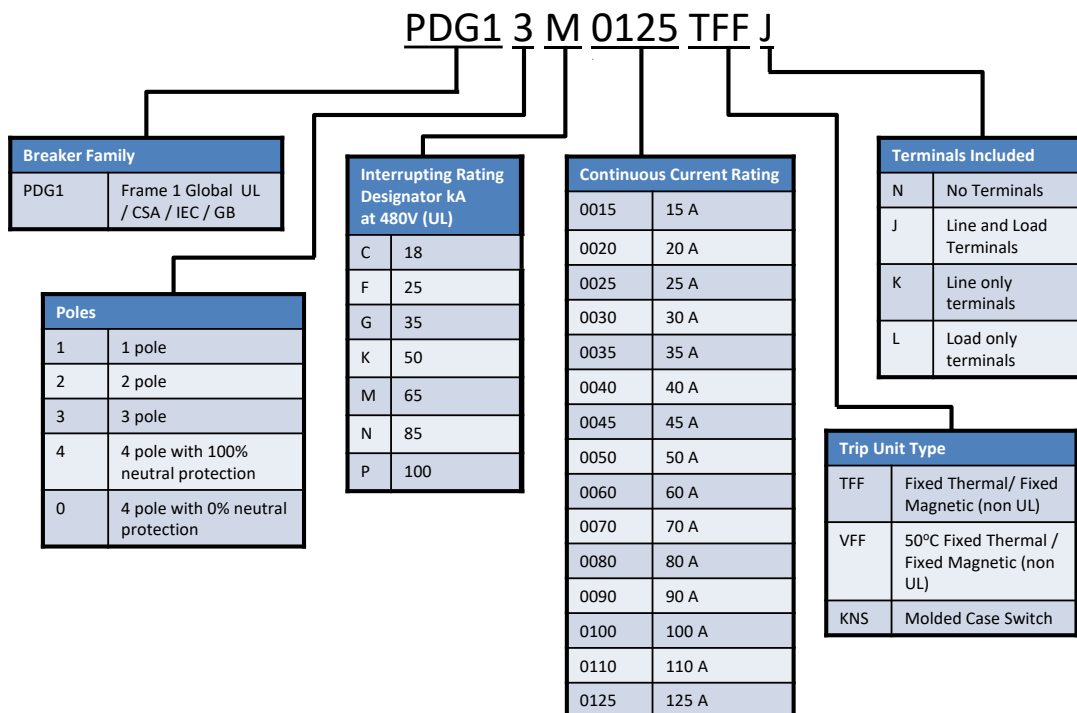


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This information is provided only as an aid to understand the catalog numbers.

It is not to be used to build catalog numbers for circuit breakers or trip units as all combinations may not be available.

Table 2. Breaker catalog number convention



Note: IEC standard breakers include the CE mark; GB standard breakers include the CCC mark.

Table 3. Symmetrical RMS interruption ratings (kA) for 1-pole breaker frame

		Voltage					
		120V	240V	277V	347V	240V	125Vdc
Globally rated	PDG11C	35	25	18	10	25	10
	PDG11F	-	35	25	14	35	22
	PDG11G	100	65	35	18	55	22
	PDG11K	-	85	50	22	85	35
	PDG11M*	200	100	65	25	100	35

Table 4. Symmetrical RMS interruption ratings (kA) for 2-, 3-, and 4-pole breaker frames

		Voltage					
		240V	480V	600Y/347V	240V	415V	250Vdc **
Globally rated	PDG1xC	25	18	10	25	20	10
	PDG1xF	35	25	14	35	25	22
	PDG1xG	65	35	18	55	36	22
	PDG1xK	85	50	22	85	50	35
	PDG1xM*	100	65	25	100	70	42
	PDG1xN*	150	85	30	150	70	42
	PDG1xP*	200	100	35	200	100	42

* Note: UL Current Limiting

** Note: 250 Vdc is achieved using 2 poles in series.

Table 5. Curve notes

1. These curves apply for 50Hz and 60Hz applications.
2. The maximum voltage rating for the frame style is stated in Tables 3 & 4.
3. These curves are comprehensive for Power Defense style circuit breakers including frame sizes, ratings and constructions stated.
4. The total clearing times shown include the response time for the trip unit, the breaker opening and the interruption of the current. The bottom of the time band is the minimum commit to trip time.
5. The end of the instantaneous curve is determined by the application or the interrupting rating of the circuit breaker.
6. Thermal magnetic trip unit calibration based on 40°C ambient, cold start. Tested with 4 feet of rated wire (75°C) per terminal. Tested in open air with current in all poles.
7. Thermal magnetic trip unit instantaneous calibration based on single pole testing.

Curves

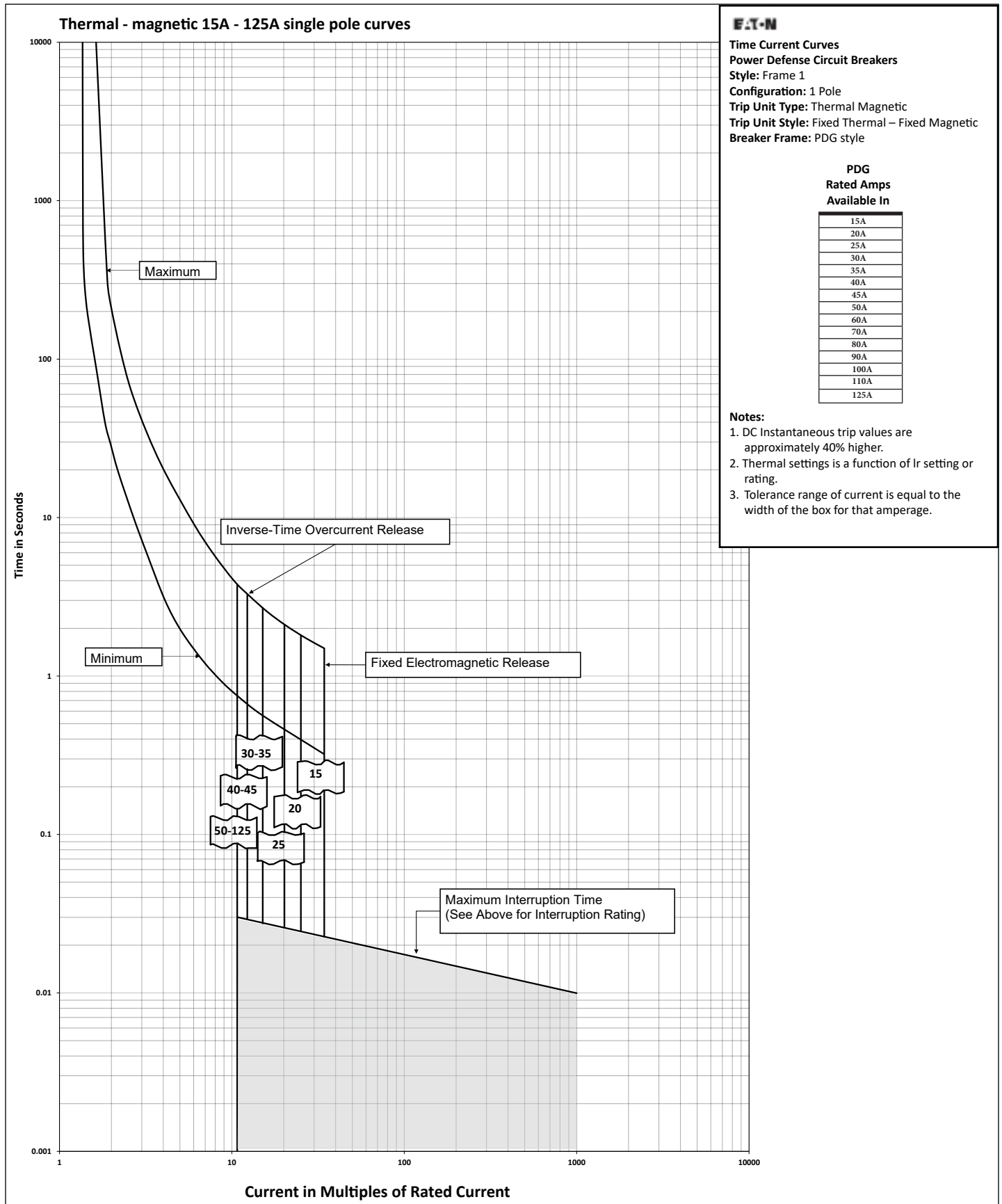


Figure 1. Fixed thermal fixed magnetic single pole 15A-125A.

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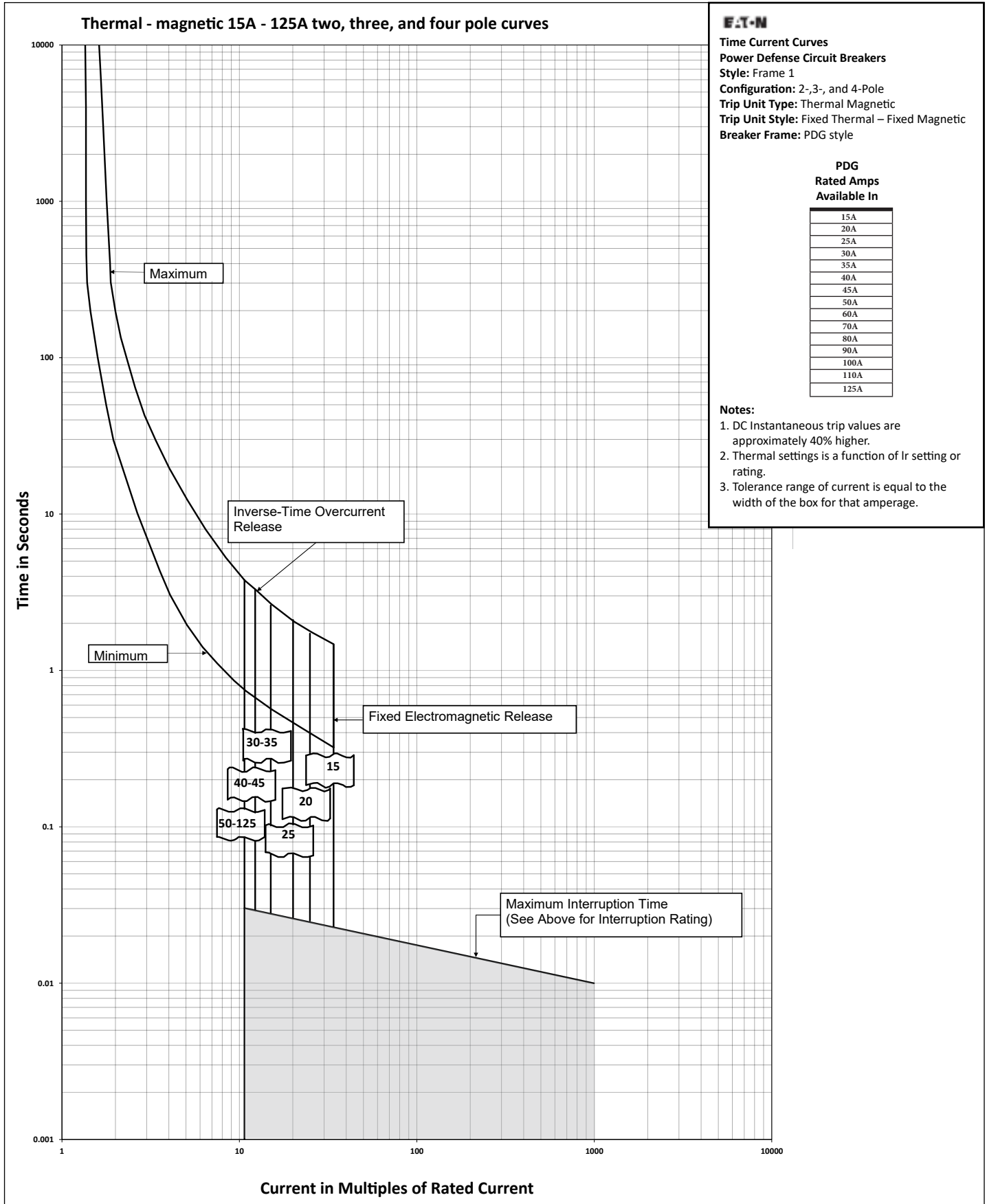


Figure 2. Fixed thermal fixed magnetic two, three, and four pole 15A-125A.

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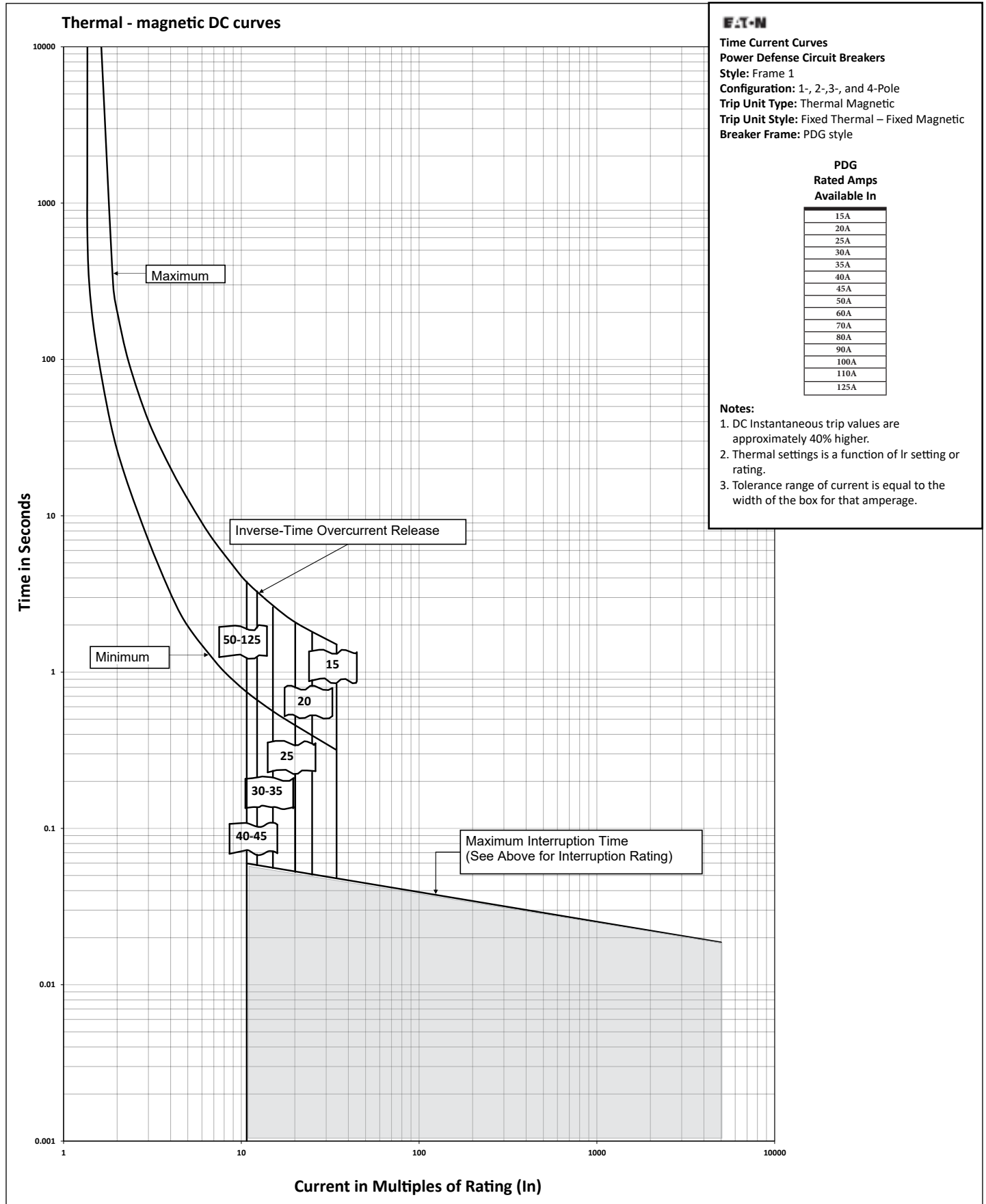


Figure 3. Fixed thermal fixed magnetic DC.

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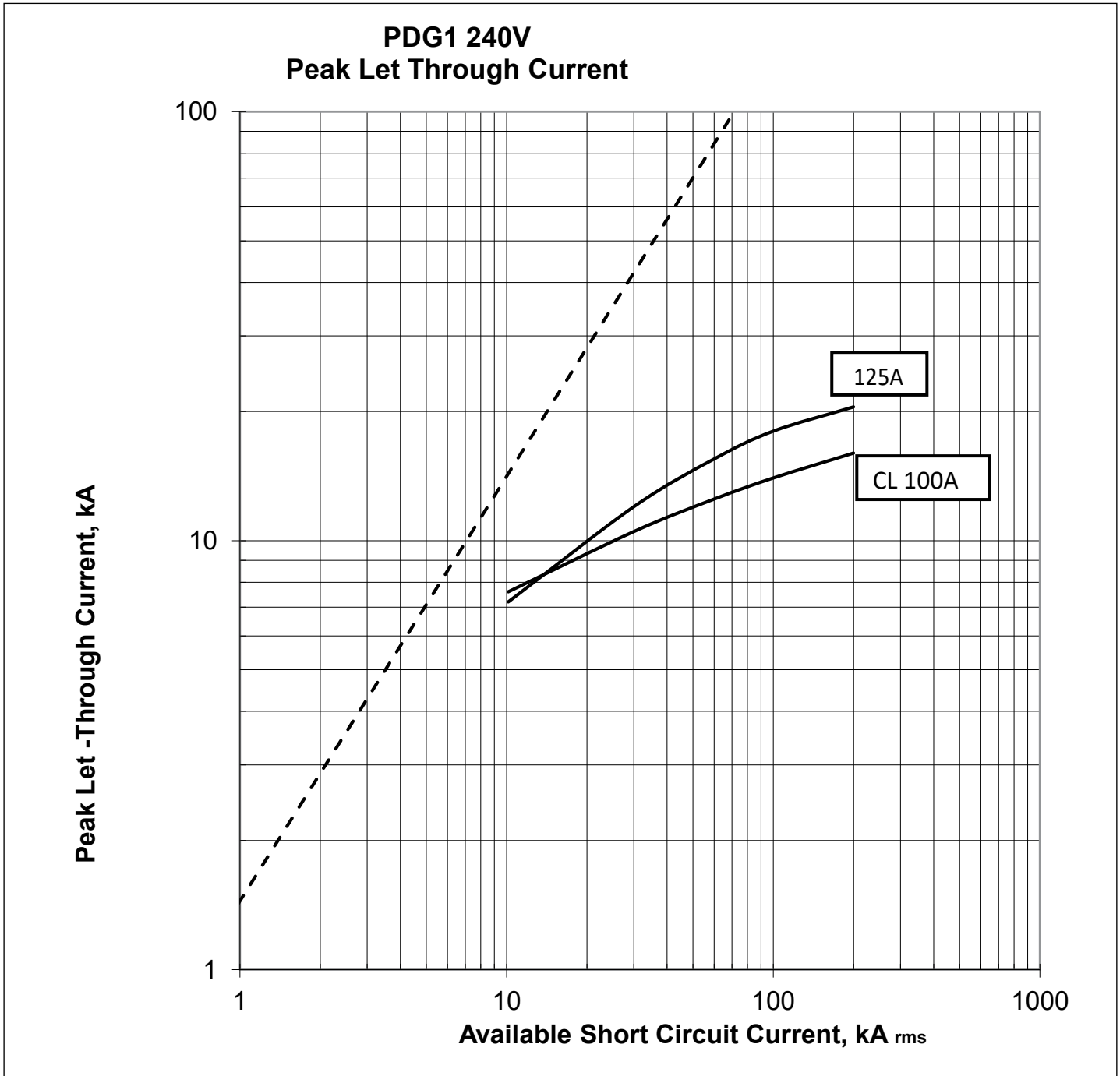


Figure 4. 240V peak let through current.

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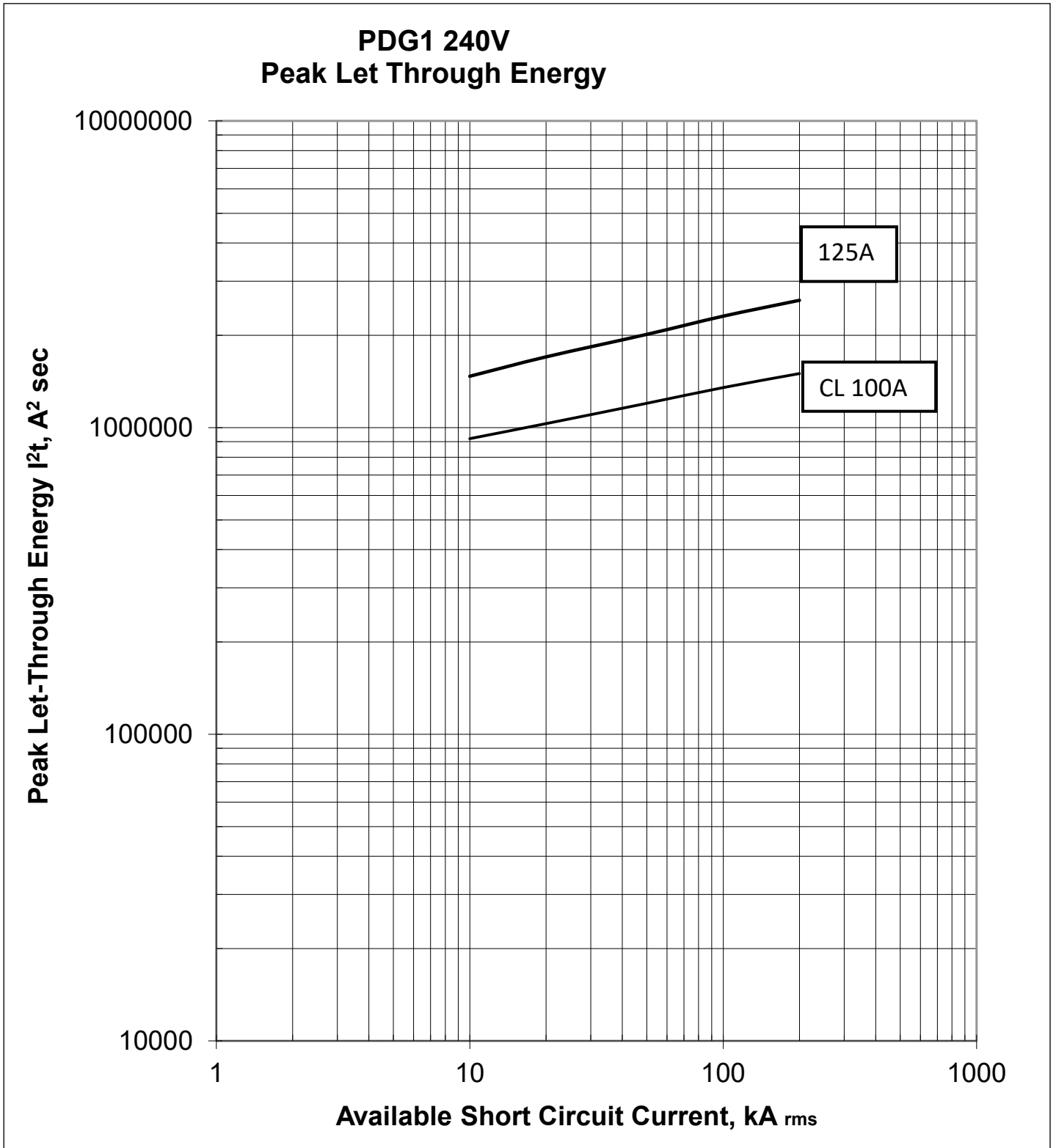


Figure 5. 240V peak let through energy.

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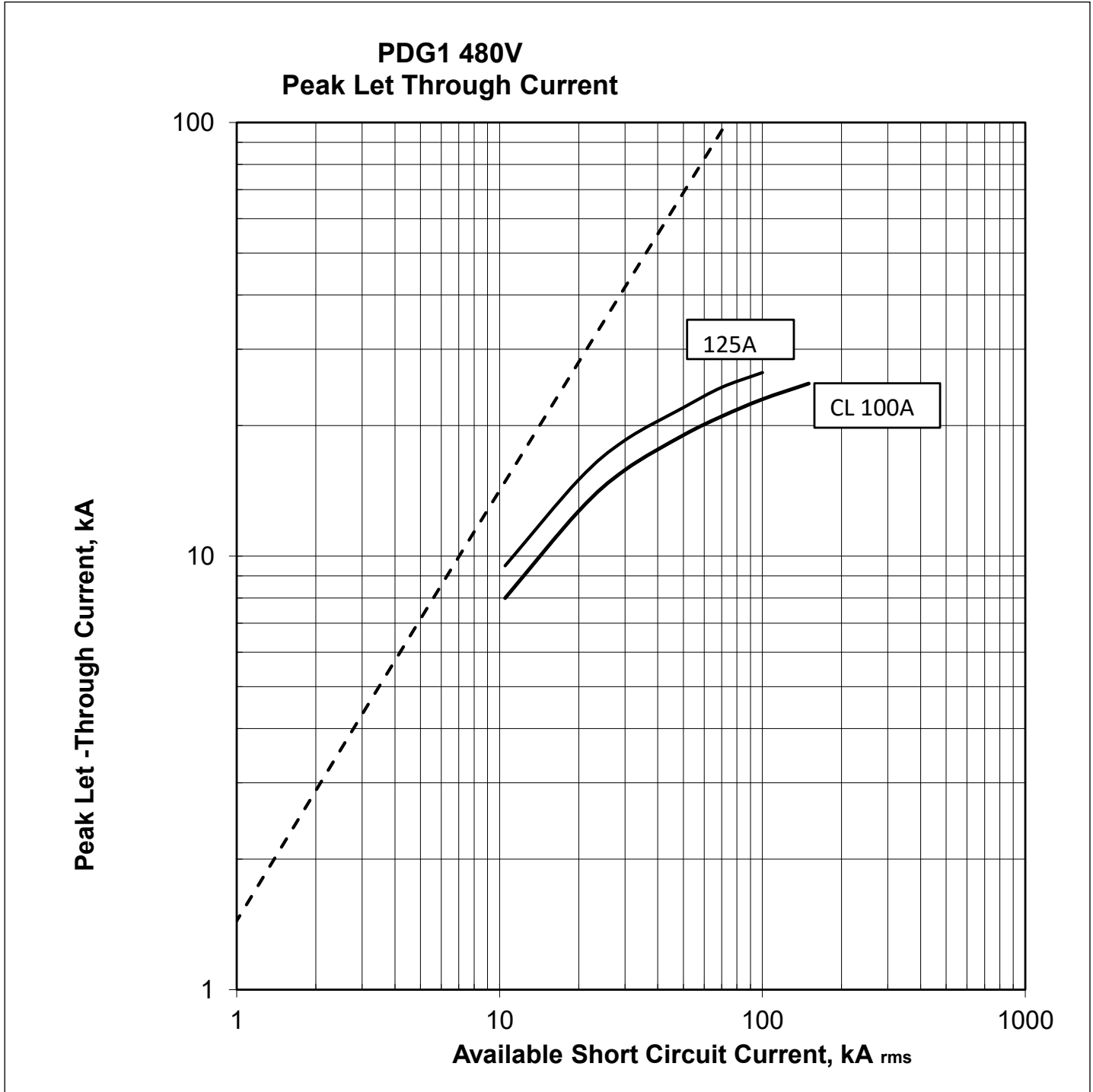


Figure 6. 480V peak let through current.

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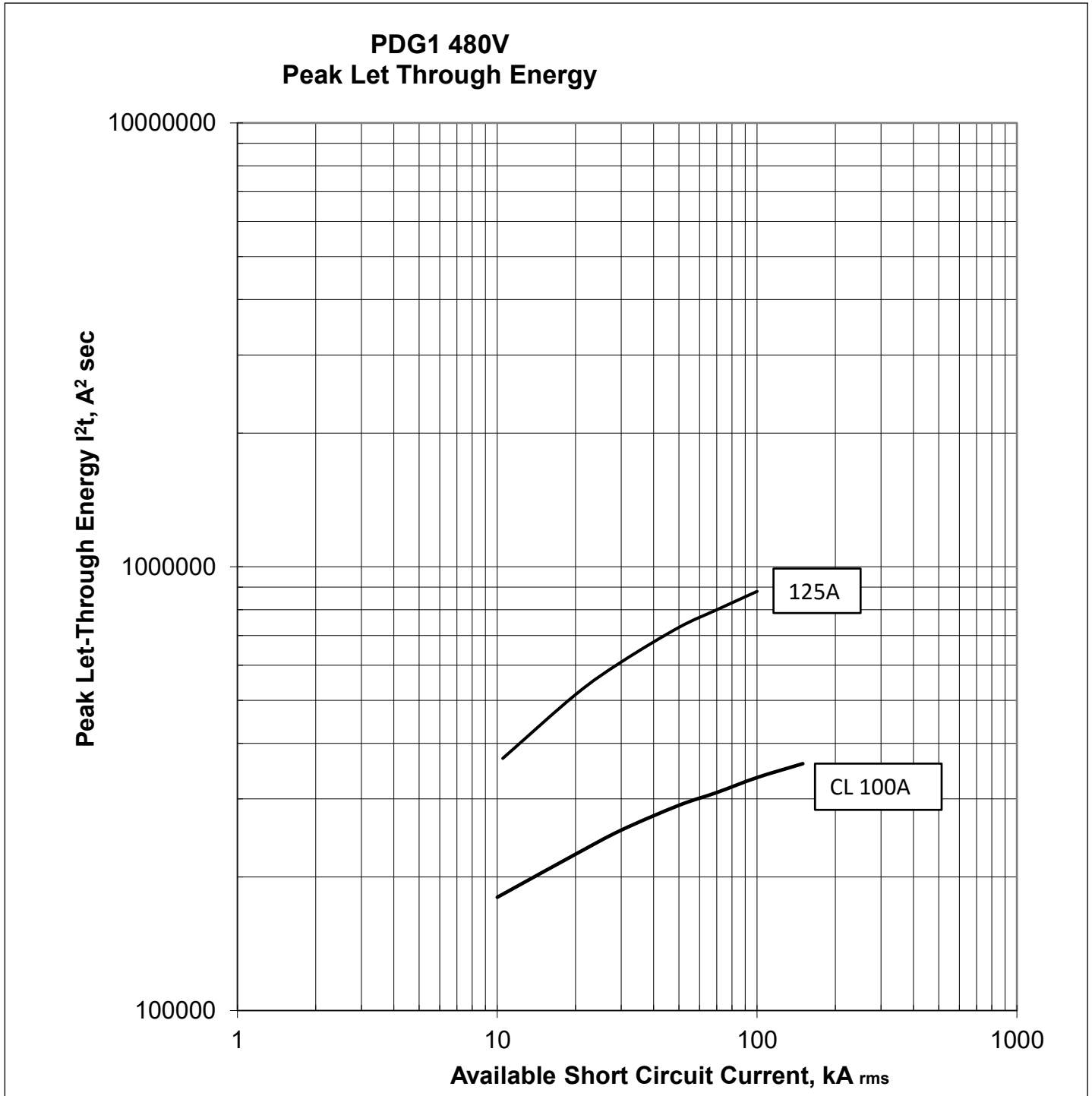


Figure 7. 480V peak let through energy.

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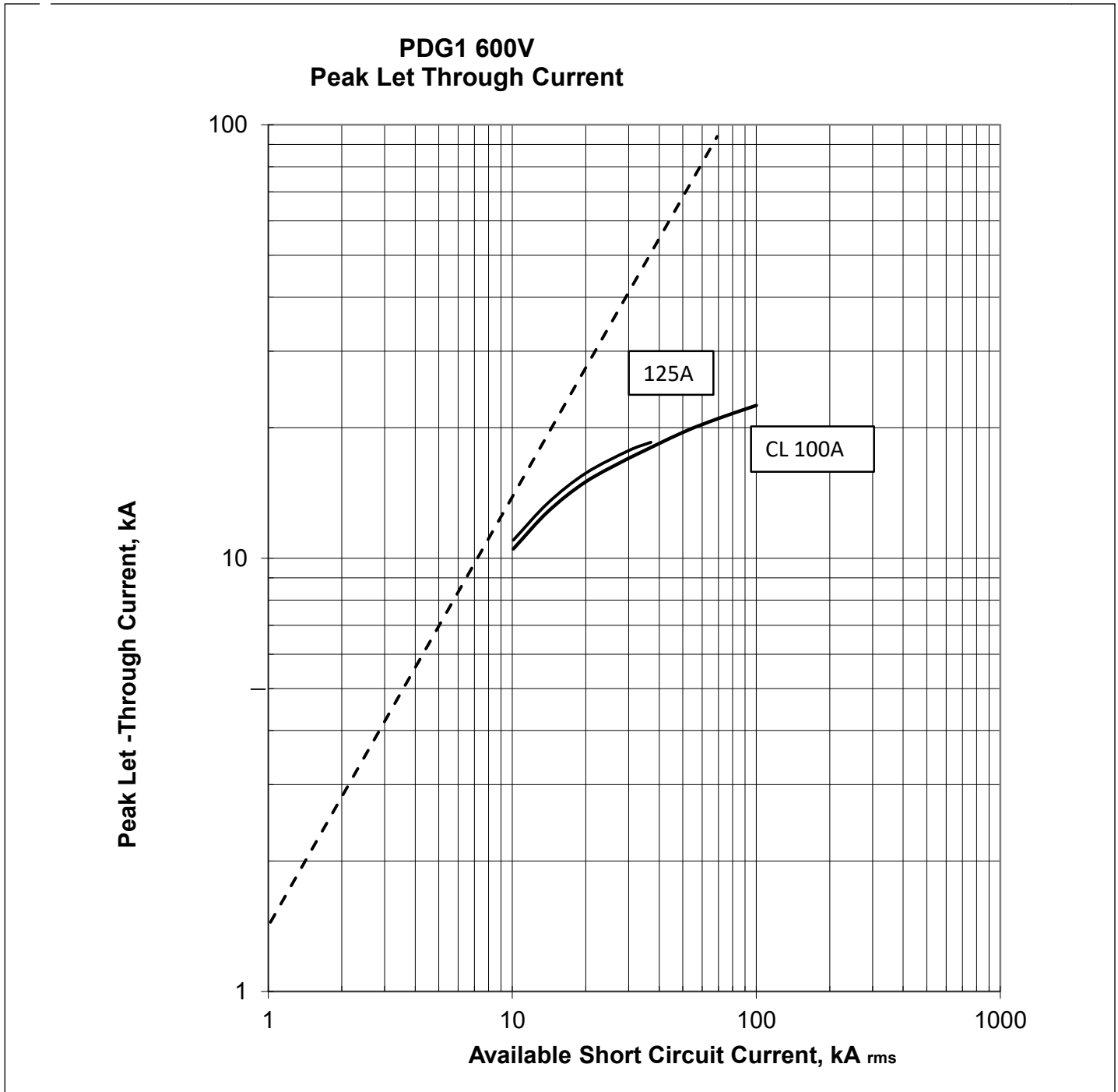


Figure 8. 600V peak let through current.

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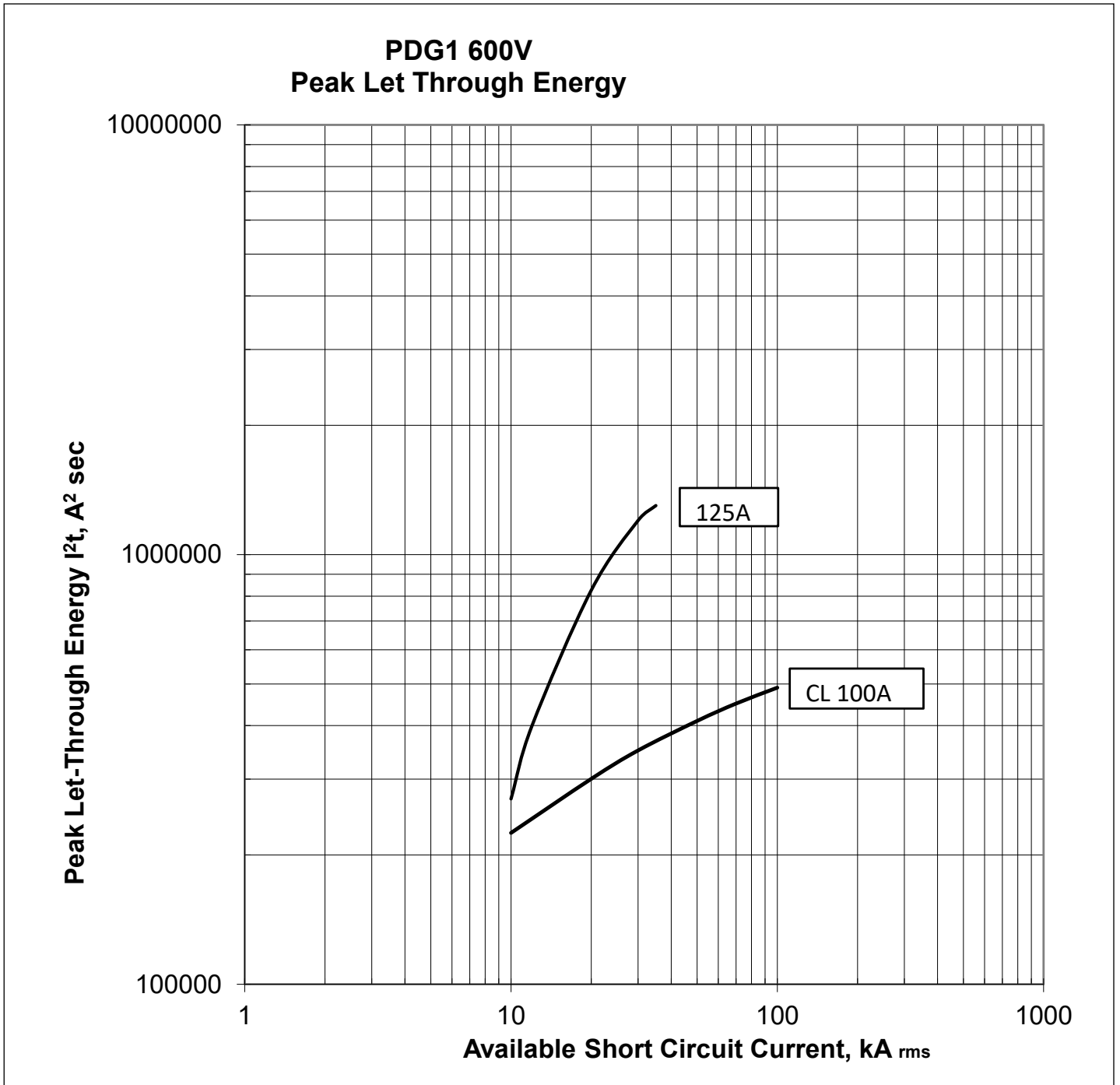


Figure 9. 600V peak let through energy.

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