Requirements for Marine Residual Fuels

Table Index

Characteristic	Limit	Category ISO - F -															
		RMA 10	RMB 10	RMC 10	RMD 15	RME 25	RMF 25	RMG 35	RMH 35	RMK 35	RMH 45	RMK 45	RML 45	RMH 55	RMK 55	RML 55	Test method reference
Density at 15ºC, kg/m 3	max.	975.0	981.0		985.0	991.0		991.0		1010.0	991.0	1010.0	-	991.0	1010.0	-	ISO 3675 or ISO 12185 (see also 6.3)
Kinematic viscosity at 100 ºC, mm 2/s - 1)	max.	10.0			15.0	25.0		35.0			45.0			55.0			ISO 3104
Flash point, ºC	min.	60			60	60		60			60			60			ISO 2719 (see also 6.4)
Pour point (upper), ºC 2) - winter quality - summer quality	 max. max.	 0 6	 24 24		 30 30	 30 30		 30 30			 30 30			 30 30			 ISO 3016 ISO 3016
Carbon residue, % (m/m)	max.	10		14	14	15	20	18	22		22		-	22		-	ISO 10370
Ash, % (m/m)	max.	0.10			0.10	0.10	0.15	0.15	0.20		0.20			0.20			ISO 6245
Water, % (V/V)	max.	0.5			0.8	1.0		1.0			1.0			1.0			ISO 3733
Sulfur, % (m/m)	max.	3.5			4.0	5.0		5.0			5.0			5.0			ISO 8754 (see also 6.6)
Vanadium, mg/kg	max.	150	300		350	200	500	300	600		600			600			ISO 14597
Aluminum plus silicon, mg/kg	max.	80			80	80		80			80			80			ISO 10478 (see also 6.8)
Total sediment, potential, % (m/m)	max.	0.10			0.10	0.10		0.10			0.10			0.10			ISO 10307-2 (see also 6.9)

1) Annex C gives a brief viscosity/temperature table, for information purposes only. 1 mm^2/s =1 cSt.
2) Purchasers should ensure that this pour point is suitable for the equipment on board, especially if the vessel operates in both the northern and southern hemispheres.

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