

Reference Values Obtained from ODS Protocol for CFC-12, CFC-11, CFC-113, CFC-114, CFC-115

		CFC-12	CFC-11	CFC-13	CFC-113	CFC-114	CFC-115		
CFC-12 10-Year Cumulative Emissions Rate (%/10 Years)	ER	95%	89%	61%	89%	78%	61%	Sec. 5.1.1 (Table 5.2)	
Refrigerant Substitute Emissions Factor (tCO ₂ e/tODS)	SE	686	223	7144	220	659	1139	Sec 5.2.1 (Table 5.4)	
Global Warming Potential (tCO ₂ e/tODS)	GWP	10900	4750	14400	6130	10000	7370	Sec. 5.1 (Table 5.1)	
Default Emission Factor for Transportation and Destruction of ODS (tCO ₂ e/tODS)	EF	7.5							Sec. 5.2.3

COD	Refrigerant Type	Measured Values		Gross Quantity of Refrigerant Destroyed (kg)	Moisture Reduction	High Boiling Residue Reduction	Total Eligible Refrigerant Destroyed (kg)	Quantity of Refrigerant Destroyed (metric tonnes)	GHG Emissions from Substitute Refrigerants	Quantity of ODS Transported to Destruction Facility	Transportation and Destruction Default Emissions Factor (tCO ₂ e)	Total Project Emissions (tCO ₂ e)	Total Project Baseline Emissions (tCO ₂ e)	Total GHG Emissions Reductions (tCO ₂ e)
		Mass of ODS in COD in kg	Concentration of ODS in Tranche											
		m	c											
				Q_g	mr	hbr	Q	Q_{ref}	Sub_{ref}	Q_d	Def	PE	BE_{ref}	ER
				$Q_g = m \times c$			$Q = Q_g - (Q_g \times mr) - (Q_g \times hbr)$	$Q_{ref} = Q \times .45359/1000$	$Sub_{ref} = Q_{ref} \times SE$		$Def = Q_d \times EF$	$PE = Sub_{ref} + Def$	$BE_{ref} = Q_{ref} \times ER \times GWP$	$ER = BE_{ref} - PE$
ISO 01	ISO 01	CFC-12	99.90%	19900.08			19898.01	19.90	13650.04				206044	
	ISO 01	CFC-11	0.00%	0.00			0.00	0.00	0.00				0	
	ISO 01	CFC-13	0.00%	0.00	0.000004	0.00010	0.00	0.00	0.00	19.92000	149.40	13799	0	192244
	ISO 01	CFC-113	0.00%	0.00			0.00	0.00	0.00				0	
	ISO 01	CFC-114	0.00%	0.00			0.00	0.00	0.00				0	
	ISO 01	CFC-115	0.00%	0.00			0.00	0.00	0.00				0	
												13799	206044	192244