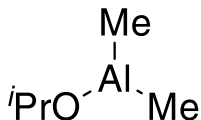


Catalog # 13-1600 Dimethylaluminum i-propoxide, 98% (99.99+%-Al) PURATREM



Thermal Behavior:

- Boiling point: 186°C [1], 172°C [8]
- Decomposition at ~370°C [8]
- Vapor pressure: 9 Torr/66.5°C [8]
- TGA data and diagram are available in [2, 8]

Technical Notes:

1. ALD precursor and dopant for aluminum containing film deposition.

Target Deposit	Deposition Technique	Delivery Temperature	Pressure	Co-reactants	Deposition Temperature	Ref.
Al ₂ O ₃	ALD	85-90°C	3 Torr	H ₂ O	100-250°C, 150°C	2-4
	ALD	60°C	-	H ₂ O	120°C	5
	AS-ALD	60°C	-	H ₂ O	50-250°C	6, 7
	PE-ALD	90°C	-	PL ₂ O ₂	25-250°C	8
	PE-ALD	90°C	-	PL ₂ O ₂	25-350°C	9
In:Al ₂ O ₃	PE-ALD	50°C	1-1.11 Torr	Et ₂ InN(TMS) ₂ , PL ₂ O ₂	250°C	10
Al:ZnO ₂	ALD	90°C	-	Et ₂ Zn, H ₂ O	250°C	12

References:

1. [Aust. J. Chem. 1966, 19, 373.](#)
2. [J. Vac. Sci. Technol. A, 2003, 21, 1366.](#)
3. [Bull. Korean Chem. Soc. 2003, 24, 1659.](#)
4. [J. Phys. Chem. C, 2017, 121, 3752.](#)
5. [J. Mater. Chem. A, 2020, 8, 4308.](#)
6. [Chem. Mater. 2020, 32, 8921.](#)
7. [ACS Nano 2020, 14, 17262.](#)
8. [J. Vac. Sci. Technol. A, 2012, 30, 021505.](#)
9. [ACS Appl. Mater. Interfaces 2021, 13, 40134.](#)
10. [Chem. Mater. 2013, 25, 4619.](#)
11. [J. Mater. Chem. C, 2015, 3, 3095.](#)
12. [Sol. Energy Mater Sol. Cells, 2017, 173, 111.](#)