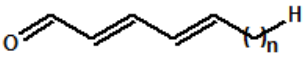
2,4-Dienals

CAS N°:	Including but not limited to: 764-40-9 142-83-6 80466-34-8 5910-85-0 30361-28-5 6750-03-4 2363-88-4 13162-46-4 21662-16-8 25152-84-5 30361-29-6 4313-03-5 (including all geometric isomers)	**Empirical formula:** **Structure:**	$C_{5+n}H_{6+2n}O$ 
Synonyms:	Including but not limited to: 2,4-Pentadienal 2,4-Hexadienal 2,4-Heptadienal 2,4-Octadienal 2,4-Nonadienal 2,4-Decadienal 2,4-Undecadienal 2,4-Dodecadienal trans,trans-2,4-Decadienal trans,trans-2,4-Undecadienal 2,4-Heptadien-1-al		

History:	Initial reviews:	New Group Standard	
	Current revision date:	June 2013	
	Implementation date:	For new submissions*:	See Note Box
		For existing fragrance compounds*:	See Note Box
	Next review date	Not applicable	

* This date applies to the supply of fragrance compounds (formulas) only, not to the finished products in the marketplace.

RECOMMENDATION:	**PROHIBITED**

RESTRICTIONS:

Limits in the finished product:			
Skin contact products:			
Leave on products:	N/A	Rinse-off products:	N/A
		Including household cleaning products	
Non skin contact products:	N/A		

2,4-Dienals

Note box:	
This IFRA Standard represents the group of 2-4-Dienals and replaces the existing individual IFRA Standards for the materials listed above. This new group also includes any other 2,4-Dienals. Note that 2,4-Hexadienal, 2,4-Heptadienal, 2,4-Octadienal, 2,4-Nonadienal, 2,4-Decadienal and 2,4-Undecadienal have already been banned via individual IFRA Standards therefore no implementation time is necessary. For all other 2,4-dienals (such as 2,4-Pentadienal and 2,4-Dodecadienal), the implementation date is August 10, 2013 for new submissions and August 10, 2014 for existing fragrance compounds.	
Fragrance material specifications:	N/A

CONTRIBUTION FROM OTHER SOURCES:

None to consider

CRITICAL EFFECT:	INSUFFICIENT DATA

REXPAN RATIONALE / CONCLUSION:

The material has been reviewed by the RIFM Expert Panel with the conclusion that it should not be used as or in fragrance ingredients until additional data is available and considered sufficient to support its safe use.
This conclusion is based on:
1) presence of structural alerts as defined in the Human Health Criteria Document (Ford et al., 2000) and/or
2) adverse data on the material itself and/or
3) adverse data for a structurally related material

REFERENCES:

Human Health Criteria Document, *Reg. Tox & Pharm*., 31, 166-181, 2000