

Glutaric acid, monoamide, N-methyl-N-benzyl-, octyl ester

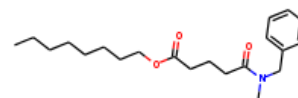
InChI: InChI=1S/C21H33NO3/c1-3-4-5-6-7-11-17-25-21(24)16-12-15-20(23)22(2)18-19-13-9-8-10-14-19/h8-10,13-14H,3-7,11-12,15-18H2,1-2H3

InChI Key: WSYUGFXQPRUZGJ-UHFFFAOYSA-N

Formula: C₂₁H₃₃NO₃

SMILES: CCCCCCOC(=O)CCCC(=O)N(C)Cc1ccccc1

Molecular Weight: 347.49



Physical Properties

Property	Value	Unit	Source
$\Delta_f G^\circ$	-13.71	kJ/mol	Joback Method
$\Delta_f H^\circ_{\text{gas}}$	-530.09	kJ/mol	Joback Method
$\Delta_{\text{fus}} H^\circ$	51.59	kJ/mol	Joback Method
$\Delta_{\text{vap}} H^\circ$	82.56	kJ/mol	Joback Method
$\log P_{\text{oct/wat}}$	4.72		Crippen Method
P_c	1279.16	kPa	Joback Method
T_{boil}	849.16	K	Joback Method
T_c	1048.11	K	Joback Method
T_{fus}	507.41	K	Joback Method
V_c	1.15	m ³ /kg-mol	Joback Method

Temperature Dependent Properties

Property	Value	Unit	Temperature (K)	Source
$C_{p,\text{gas}}$	950.52	J/mol×K	849.16	Joback Method

Sources

Joback Method: https://en.wikipedia.org/wiki/Joback_method

NIST Webbook: [http://webbook.nist.gov/cgi/inchi/InChI=1S/C21H33NO3/c1-3-4-5-6-7-11-17-25-21\(24\)16-12-15-20\(23\)22\(2\)18-19-13-9-8-10-14-19/h8-10,13-14H,3-7,11-12,15-18H2,1-2H3](http://webbook.nist.gov/cgi/inchi/InChI=1S/C21H33NO3/c1-3-4-5-6-7-11-17-25-21(24)16-12-15-20(23)22(2)18-19-13-9-8-10-14-19/h8-10,13-14H,3-7,11-12,15-18H2,1-2H3)

Crippen Method: <http://pubs.acs.org/doi/abs/10.1021/ci9903071>

Legend

$C_{p, gas}$: Ideal gas heat capacity (J/mol×K).

$\Delta_f G^\circ$: Standard Gibbs free energy of formation (kJ/mol).

$\Delta_f H^\circ_{gas}$: Enthalpy of formation at standard conditions (kJ/mol).

$\Delta_{fus} H^\circ$: Enthalpy of fusion at standard conditions (kJ/mol).

$\Delta_{vap} H^\circ$: Enthalpy of vaporization at standard conditions (kJ/mol).

$logP_{oct/wat}$: Octanol/Water partition coefficient .

P_c : Critical Pressure (kPa).

T_{boil} : Normal Boiling Point Temperature (K).

T_c : Critical Temperature (K).

T_{fus} : Normal melting (fusion) point (K).

V_c : Critical Volume (m³/kg-mol).

Latest version available from:

<https://www.cheméo.com/cid/35-460-2/Glutaric%20acid%2C%20monoamide%2C%20N-methyl-N-benzyl-%2C%20octyl%20ester>

Generated by Cheméo on Sat, 19 Jun 2021 12:12:33 +0000.

Cheméo (<https://www.cheméo.com>) is the biggest free database of chemical and physical data for the process industry.