

Benzo[ghi]cyclopenta[cd]perylene

InChI: InChI=1S/C24H12/c1-2-13-4-5-15-7-9-17-12-16-8-6-14-10-11-19-18(3-1)21(13)22(15)23(17)24(19)20(14)16/h1-12H

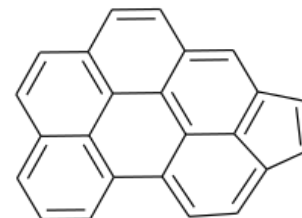
InChI Key: MUDPUADNICLBBZ-UHFFFAOYSA-N

Formula: C₂₄H₁₂

SMILES: c1cc2cc3ccc4ccc5cccc6c7ccc1c2c7c3c4c56

Molecular Weight: 300.35

CAS: 190-88-5



Physical Properties

Property	Value	Unit	Source
$\Delta_f G^\circ$	838.08	kJ/mol	Joback Method
$\Delta_f H^\circ_{\text{gas}}$	650.53	kJ/mol	Joback Method
$\Delta_{\text{fus}} H^\circ$	41.06	kJ/mol	Joback Method
$\Delta_{\text{vap}} H^\circ$	82.54	kJ/mol	Joback Method
$\log P_{\text{oct/wat}}$	6.919		Crippen Method
P_c	2370.28	kPa	Joback Method
T_{boil}	890.88	K	Joback Method
T_c	1154.51	K	Joback Method
T_{fus}	664.30	K	Joback Method
V_c	0.893	m ³ /kg-mol	Joback Method

Temperature Dependent Properties

Property	Value	Unit	Temperature (K)	Source
$C_{p,\text{gas}}$	625.52	J/mol×K	890.88	Joback Method
η	0.0313800	Paxs	890.88	Joback Method

Sources

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

NIST Webbook: [http://webbook.nist.gov/cgi/inchi/InChI=1S/C24H12/c1-2-13-4-5-15-7-9-17-12-16-8-6-14-10-11-19-18\(3-1\)21\(13\)22\(15\)23\(17\)24\(19\)20\(14\)16/h1-12H](http://webbook.nist.gov/cgi/inchi/InChI=1S/C24H12/c1-2-13-4-5-15-7-9-17-12-16-8-6-14-10-11-19-18(3-1)21(13)22(15)23(17)24(19)20(14)16/h1-12H)

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

Legend

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

η : Dynamic viscosity (Pa \times s).

$\Delta_f G^\circ$: 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).

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