

DIAMAGNETIC SUSCEPTIBILITY OF SELECTED ORGANIC COMPOUNDS

When a material is placed in a magnetic field H , a magnetization M is induced in the material which is related to H by $M = \kappa H$, where κ is called the volume susceptibility. Since H and M have the same dimensions, κ is dimensionless. A more useful parameter is the molar susceptibility χ_m , defined by

$$\chi_m = \kappa V_m = \kappa M/\rho$$

where V_m is the molar volume of the substance, M the molar mass, and ρ the mass density. When the cgs system is used, the customary unit for χ_m is $\text{cm}^3 \text{mol}^{-1}$; the corresponding SI unit is $\text{m}^3 \text{mol}^{-1}$. Substances with no unpaired electrons are called diamagnetic; they have negative values of χ_m .

This table gives values of the diamagnetic susceptibility for about 400 common organic compounds. All values refer to room temperature and atmospheric pressure and to the physical form

that is stable under these conditions. Substances are arranged by molecular formula in Hill order. A more extensive table may be found in Reference 1.

In keeping with customary practice, the molar susceptibility is given here in units appropriate to the cgs system. These values should be multiplied by 4π to obtain values for use in SI equations (where the magnetic field strength H has units of A m^{-1}).

References

1. *Landolt-Börnstein, Numerical Data and Functional Relationships in Science and Technology, New Series, II/16, Diamagnetic Susceptibility*, Gupta, R. R., Ed., Springer-Verlag, Heidelberg, 1986.
2. Barter, C., Meisenheimer, R. G., and Stevenson, D. P., *J. Phys. Chem.* 64, 1312, 1960.
3. Broersma, S., *J. Chem. Phys.* 17, 873, 1949.

Molecular formula	Compound	$-\chi_m/10^{-6} \text{ cm}^3 \text{ mol}^{-1}$	Molecular formula	Compound	$-\chi_m/10^{-6} \text{ cm}^3 \text{ mol}^{-1}$
CBrCl ₃	Bromotrichloromethane	73.2	CN ₄ O ₈	Tetranitromethane	43.0
CBr ₄	Tetrabromomethane	93.7	C ₂ ClF ₃	Chlorotrifluoroethylene	49.1
CClF ₃	Chlorotrifluoromethane	45.3	C ₂ Cl ₄	Tetrachloroethylene	81.6
CClN	Cyanogen chloride	32.4	C ₂ Cl ₆	Hexachloroethane	112.8
CCl ₂ F ₂	Dichlorodifluoromethane	52.2	C ₂ HCl ₃	Trichloroethylene	65.8
CCl ₂ O	Carbonyl chloride	47.9	C ₂ HCl ₃ O	Trichloroacetaldehyde	73.0
CCl ₃ F	Trichlorofluoromethane	58.7	C ₂ HCl ₃ O	Dichloroacetyl chloride	69.0
CCl ₃ NO ₂	Trichloronitromethane	75.3	C ₂ HCl ₃ O ₂	Trichloroacetic acid	73.0
CCl ₄	Tetrachloromethane	66.8	C ₂ HCl ₅	Pentachloroethane	99.1
CHBrCl ₂	Bromodichloromethane	66.3	C ₂ HF ₃ O ₂	Trifluoroacetic acid	43.3
CHBr ₃	Tribromomethane	82.6	C ₂ H ₂	Acetylene	20.8
CHCl ₃	Trichloromethane	58.9	C ₂ H ₂ Br ₄	1,1,2,2-Tetrabromoethane	123.4
CHI ₃	Triiodomethane	117.1	C ₂ H ₂ Cl ₂	1,1-Dichloroethylene	49.2
CH ₂ BrCl	Bromochloromethane	55.1	C ₂ H ₂ Cl ₂	<i>cis</i> -1,2-Dichloroethylene	51.0
CH ₂ Br ₂	Dibromomethane	65.1	C ₂ H ₂ Cl ₂	<i>trans</i> -1,2-Dichloroethylene	48.9
CH ₂ Cl ₂	Dichloromethane	46.6	C ₂ H ₂ Cl ₄	1,1,2,2-Tetrachloroethane	89.8
CH ₂ I ₂	Diiodomethane	93.1	C ₂ H ₃ Cl	Chloroethylene	35.9
CH ₂ N ₂	Cyanamide	24.8	C ₂ H ₃ ClO	Acetyl chloride	39.3
CH ₂ O	Formaldehyde	18.6	C ₂ H ₃ N	Acetonitrile	27.8
CH ₂ O ₂	Formic acid	19.9	C ₂ H ₄	Ethylene	18.8
CH ₃ Br	Bromomethane	42.8	C ₂ H ₄ Br ₂	1,2-Dibromoethane	78.9
CH ₃ Cl	Chloromethane	32.0	C ₂ H ₄ Cl ₂	1,1-Dichloroethane	57.4
CH ₃ F	Fluoromethane	17.8	C ₂ H ₄ Cl ₂	1,2-Dichloroethane	59.6
CH ₃ I	Iodomethane	57.2	C ₂ H ₄ O	Acetaldehyde	22.2
CH ₃ NO	Formamide	23.0	C ₂ H ₄ O	Ethylene oxide	30.5
CH ₃ NO ₂	Nitromethane	21.0	C ₂ H ₄ O ₂	Acetic acid	31.8
CH ₄	Methane	17.4	C ₂ H ₄ O ₂	Methyl formate	31.1
CH ₄ N ₂ O	Urea	33.5	C ₂ H ₅ Br	Bromoethane	78.8
CH ₄ O	Methanol	21.4	C ₂ H ₅ Cl	Chloroethane	69.9
CH ₅ N	Methylamine	27.0	C ₂ H ₅ I	Iodoethane	69.1
Cl ₄	Tetraiodomethane	136	C ₂ H ₅ NO	Acetamide	33.9

Molecular formula	Compound	$-\chi_m/10^{-6} \text{ cm}^3 \text{ mol}^{-1}$	Molecular formula	Compound	$-\chi_m/10^{-6} \text{ cm}^3 \text{ mol}^{-1}$
C ₂ H ₅ NO ₂	Nitroethane	35.4	C ₄ H ₆	1,2-Butadiene	35.6
C ₂ H ₅ NO ₂	Glycine	39.6	C ₄ H ₆	1,3-Butadiene	32.1
C ₂ H ₆	Ethane	26.8	C ₄ H ₆ O ₂	Vinyl acetate	46.4
C ₂ H ₆ O	Ethanol	33.7	C ₄ H ₆ O ₃	Acetic anhydride	52.8
C ₂ H ₆ O	Dimethyl ether	26.3	C ₄ H ₆ O ₄	Succinic acid	58.0
C ₂ H ₆ O ₂	Ethylene glycol	38.9	C ₄ H ₆ O ₄	Dimethyl oxalate	55.7
C ₂ H ₆ S	Ethanethiol	47.0	C ₄ H ₇ N	Butanenitrile	50.4
C ₂ H ₆ S	Dimethyl sulfide	44.9	C ₄ H ₈	1-Butene	41.0
C ₂ H ₈ N ₂	1,2-Ethanediamine	46.5	C ₄ H ₈	<i>cis</i> -2-Butene	42.6
C ₂ N ₂	Cyanogen	21.6	C ₄ H ₈	<i>trans</i> -2-Butene	43.3
C ₃ H ₄	Allene	25.3	C ₄ H ₈	Isobutene	40.8
C ₃ H ₄ O ₂	Vinyl formate	34.7	C ₄ H ₈	Cyclobutane	40.0
C ₃ H ₅ Br	3-Bromopropene	58.6	C ₄ H ₈ O	Ethyl vinyl ether	47.9
C ₃ H ₅ Cl	2-Chloropropene	47.8	C ₄ H ₈ O	1,2-Epoxybutane	54.8
C ₃ H ₅ Cl	3-Chloropropene	47.8	C ₄ H ₈ O	Butanal	45.9
C ₃ H ₅ N	Propanenitrile	38.6	C ₄ H ₈ O	2-Butanone	45.6
C ₃ H ₆	Propene	30.7	C ₄ H ₈ O ₂	Butanoic acid	55.2
C ₃ H ₆	Cyclopropane	39.2	C ₄ H ₈ O ₂	2-Methylpropanoic acid	56.1
C ₃ H ₆ O	Allyl alcohol	36.7	C ₄ H ₈ O ₂	Propyl formate	55.0
C ₃ H ₆ O	Propanal	34.2	C ₄ H ₈ O ₂	Ethyl acetate	54.1
C ₃ H ₆ O	Acetone	33.8	C ₄ H ₈ O ₂	Methyl propanoate	54.5
C ₃ H ₆ O	Methyloxirane	42.5	C ₄ H ₈ O ₂	1,4-Dioxane	52.2
C ₃ H ₆ O ₂	Propanoic acid	43.2	C ₄ H ₉ Br	1-Bromobutane	77.1
C ₃ H ₆ O ₂	Ethyl formate	42.4	C ₄ H ₉ Br	1-Bromo-2-methylpropane	79.9
C ₃ H ₇ Br	1-Bromopropane	65.6	C ₄ H ₉ Cl	1-Chlorobutane	67.1
C ₃ H ₇ Br	2-Bromopropane	65.1	C ₄ H ₉ Cl	2-Chlorobutane	67.4
C ₃ H ₇ Cl	1-Chloropropane	56.0	C ₄ H ₉ I	1-Iodobutane	93.6
C ₃ H ₇ I	1-Iodopropane	84.3	C ₄ H ₉ N	Pyrrolidine	54.8
C ₃ H ₇ N	Allylamine	40.1	C ₄ H ₉ NO	Morpholine	55.0
C ₃ H ₇ NO ₂	1-Nitropropane	45.0	C ₄ H ₁₀	Butane	50.3
C ₃ H ₇ NO ₂	2-Nitropropane	45.4	C ₄ H ₁₀	Isobutane	50.5
C ₃ H ₇ NO ₂	Ethyl carbamate	57.0	C ₄ H ₁₀ O	1-Butanol	56.4
C ₃ H ₈	Propane	38.6	C ₄ H ₁₀ O	2-Butanol	57.6
C ₃ H ₈ O	1-Propanol	44.8	C ₄ H ₁₀ O	2-Methyl-1-propanol	57.6
C ₃ H ₈ O	2-Propanol	45.7	C ₄ H ₁₀ O	2-Methyl-2-propanol	56.6
C ₃ H ₈ O ₂	1,3-Propylene glycol	50.2	C ₄ H ₁₀ O	Diethyl ether	55.5
C ₃ H ₈ O ₂	Dimethoxymethane	47.3	C ₄ H ₁₀ O ₂	1,3-Butanediol	61.8
C ₃ H ₈ O ₃	Glycerol	57.1	C ₄ H ₁₀ O ₂	1,4-Butanediol	61.8
C ₄ H ₂ O ₃	Maleic anhydride	35.8	C ₄ H ₁₀ S	1-Butanethiol	70.2
C ₄ H ₄ N ₂	Pyrazine	37.8	C ₄ H ₁₁ N	Butylamine	58.9
C ₄ H ₄ N ₂	Pyrimidine	43.1	C ₄ H ₁₁ N	Isobutylamine	59.8
C ₄ H ₄ O	Furan	43.1	C ₄ H ₁₁ N	Diethylamine	56.8
C ₄ H ₄ O ₃	Succinic anhydride	47.5	C ₅ H ₄ O ₂	Furfural	47.2
C ₄ H ₄ O ₄	Maleic acid	49.6	C ₅ H ₅ N	Pyridine	48.7
C ₄ H ₄ O ₄	Fumaric acid	49.1	C ₅ H ₆ O ₂	Furfuryl alcohol	61.0
C ₄ H ₄ S	Thiophene	57.3	C ₅ H ₇ NO ₂	Ethyl cyanoacetate	67.3
C ₄ H ₅ N	Pyrrole	48.6	C ₅ H ₈	2-Methyl-1,3-butadiene	46.0

Molecular formula	Compound	$-\chi_m/10^{-6} \text{ cm}^3 \text{ mol}^{-1}$	Molecular formula	Compound	$-\chi_m/10^{-6} \text{ cm}^3 \text{ mol}^{-1}$
C ₅ H ₈ O	Cyclopentanone	51.6	C ₆ H ₆ ClN	<i>o</i> -Chloroaniline	79.5
C ₅ H ₈ O ₂	Methyl methacrylate	57.3	C ₆ H ₆ ClN	<i>m</i> -Chloroaniline	76.6
C ₅ H ₈ O ₂	2,4-Pentanedione	54.9	C ₆ H ₆ ClN	<i>p</i> -Chloroaniline	76.7
C ₅ H ₁₀	1-Pentene	54.6	C ₆ H ₆ N ₂ O ₂	<i>o</i> -Nitroaniline	67.4
C ₅ H ₁₀	2-Methyl-2-butene	54.7	C ₆ H ₆ N ₂ O ₂	<i>m</i> -Nitroaniline	69.7
C ₅ H ₁₀	Cyclopentane	56.2	C ₆ H ₆ N ₂ O ₂	<i>p</i> -Nitroaniline	68.0
C ₅ H ₁₀ O	Cyclopentanol	64.0	C ₆ H ₆ O	Phenol	60.6
C ₅ H ₁₀ O	Pentanal	57.5	C ₆ H ₆ O ₂	<i>p</i> -Hydroquinone	64.7
C ₅ H ₁₀ O	2-Pentanone	57.5	C ₆ H ₆ O ₂	Pyrocatechol	68.2
C ₅ H ₁₀ O	3-Pentanone	57.7	C ₆ H ₆ O ₂	Resorcinol	67.2
C ₅ H ₁₀ O ₂	Pentanoic acid	66.5	C ₆ H ₇ N	Aniline	62.4
C ₅ H ₁₀ O ₂	3-Methylbutanoic acid	67.7	C ₆ H ₇ N	4-Methylpyridine	59.8
C ₅ H ₁₀ O ₂	Butyl formate	65.8	C ₆ H ₈	1,4-Cyclohexadiene	48.7
C ₅ H ₁₀ O ₂	Isobutyl formate	66.8	C ₆ H ₈ N ₂	<i>o</i> -Phenylenediamine	72.5
C ₅ H ₁₀ O ₂	Propyl acetate	65.9	C ₆ H ₈ N ₂	<i>m</i> -Phenylenediamine	70.4
C ₅ H ₁₀ O ₂	Isopropyl acetate	67.0	C ₆ H ₈ N ₂	<i>p</i> -Phenylenediamine	70.7
C ₅ H ₁₀ O ₂	Ethyl propanoate	66.3	C ₆ H ₁₀	1,5-Hexadiene	55.1
C ₅ H ₁₀ O ₂	Tetrahydrofurfuryl alcohol	69.4	C ₆ H ₁₀	1-Hexyne	64.5
C ₅ H ₁₀ O ₃	Diethyl carbonate	75.4	C ₆ H ₁₀	Cyclohexene	58.0
C ₅ H ₁₁ N	Piperidine	64.2	C ₆ H ₁₀ O	Cyclohexanone	62.0
C ₅ H ₁₂	Pentane	61.5	C ₆ H ₁₀ O ₃	Ethyl acetoacetate	71.7
C ₅ H ₁₂	Isopentane	63.0	C ₆ H ₁₀ O ₄	Diethyl oxalate	81.7
C ₅ H ₁₂	Neopentane	63.0	C ₆ H ₁₂	1-Hexene	66.4
C ₅ H ₁₂ O	1-Pentanol	67.0	C ₆ H ₁₂	2,3-Dimethyl-2-butene	65.9
C ₅ H ₁₂ O	2-Pentanol	69.1	C ₆ H ₁₂	Cyclohexane	68
C ₅ H ₁₂ O ₂	1,5-Pentanediol	73.5	C ₆ H ₁₂	Methylcyclopentane	70.2
C ₅ H ₁₃ N	Pentylamine	69.3	C ₆ H ₁₂ O	Hexanal	69.4
C ₆ Cl ₆	Hexachlorobenzene	147.0	C ₆ H ₁₂ O	2-Hexanone	69.2
C ₆ H ₄ ClNO ₂	1-Chloro-2-nitrobenzene	75.5	C ₆ H ₁₂ O	3-Hexanone	69.0
C ₆ H ₄ ClNO ₂	1-Chloro-3-nitrobenzene	77.2	C ₆ H ₁₂ O	4-Methyl-2-pentanone	69.7
C ₆ H ₄ ClNO ₂	1-Chloro-4-nitrobenzene	74.7	C ₆ H ₁₂ O	Cyclohexanol	73.4
C ₆ H ₄ Cl ₂	<i>o</i> -Dichlorobenzene	84.4	C ₆ H ₁₂ O ₂	Hexanoic acid	78.1
C ₆ H ₄ Cl ₂	<i>m</i> -Dichlorobenzene	84.1	C ₆ H ₁₂ O ₂	Isopentyl formate	78.4
C ₆ H ₄ Cl ₂	<i>p</i> -Dichlorobenzene	81.7	C ₆ H ₁₂ O ₂	Isobutyl acetate	78.7
C ₆ H ₄ O ₂	<i>p</i> -Benzoquinone	36	C ₆ H ₁₂ O ₂	Propyl propanoate	77.7
C ₆ H ₅ Br	Bromobenzene	78.4	C ₆ H ₁₂ O ₃	Paraldehyde	86.1
C ₆ H ₅ Cl	Chlorobenzene	69.5	C ₆ H ₁₄	Hexane	74.1
C ₆ H ₅ ClO	<i>o</i> -Chlorophenol	77.3	C ₆ H ₁₄	2-Methylpentane	75.3
C ₆ H ₅ ClO	<i>m</i> -Chlorophenol	77.6	C ₆ H ₁₄	3-Methylpentane	75.5
C ₆ H ₅ ClO	<i>p</i> -Chlorophenol	77.7	C ₆ H ₁₄	2,2-Dimethylbutane	76.2
C ₆ H ₅ F	Fluorobenzene	58.4	C ₆ H ₁₄	2,3-Dimethylbutane	76.2
C ₆ H ₅ I	Iodobenzene	92.0	C ₆ H ₁₄ O	1-Hexanol	79.5
C ₆ H ₅ NO ₂	Nitrobenzene	61.9	C ₆ H ₁₄ O	4-Methyl-2-pentanol	80.4
C ₆ H ₅ NO ₃	<i>o</i> -Nitrophenol	68.9	C ₆ H ₁₄ O	Dipropyl ether	79.4
C ₆ H ₅ NO ₃	<i>m</i> -Nitrophenol	65.9	C ₆ H ₁₄ O ₂	1,6-Hexanediol	84.3
C ₆ H ₅ NO ₃	<i>p</i> -Nitrophenol	66.9	C ₆ H ₁₄ O ₂	1,1-Diethoxyethane	81.4
C ₆ H ₆	Benzene	54.8	C ₆ H ₁₄ O ₆	<i>D</i> -Glucitol	107.8

Molecular formula	Compound	$-\chi_m/10^{-6} \text{ cm}^3 \text{ mol}^{-1}$	Molecular formula	Compound	$-\chi_m/10^{-6} \text{ cm}^3 \text{ mol}^{-1}$
C ₆ H ₁₅ N	Triethylamine	83.3	C ₇ H ₁₆	3,3-Dimethylpentane	89.5
C ₇ H ₅ N	Benzonitrile	65.2	C ₇ H ₁₆ O	1-Heptanol	91.7
C ₇ H ₆ O	Benzaldehyde	60.7	C ₇ H ₁₆ O	4-Heptanol	92.1
C ₇ H ₆ O ₂	Salicylaldehyde	66.8	C ₈ H ₄ O ₃	Phthalic anhydride	66.7
C ₇ H ₆ O ₃	Salicylic acid	75	C ₈ H ₆ O ₄	Phthalic acid	83.6
C ₇ H ₇ Br	<i>p</i> -Bromotoluene	88.7	C ₈ H ₆ O ₄	Isophthalic acid	84.6
C ₇ H ₇ Cl	<i>o</i> -Chlorotoluene	82.4	C ₈ H ₆ O ₄	Terephthalic acid	83.5
C ₇ H ₇ Cl	<i>m</i> -Chlorotoluene	79.7	C ₈ H ₇ N	Benzeneacetonitrile	76.9
C ₇ H ₇ Cl	<i>p</i> -Chlorotoluene	80.3	C ₈ H ₇ N	Indole	85.0
C ₇ H ₇ Cl	(Chloromethyl)benzene	81.6	C ₈ H ₈	Styrene	68.2
C ₇ H ₇ NO	Benzamide	72.0	C ₈ H ₈ O	Acetophenone	72.5
C ₇ H ₇ NO ₂	<i>o</i> -Nitrotoluene	72.2	C ₈ H ₈ O ₂	<i>o</i> -Toluic acid	84.3
C ₇ H ₇ NO ₂	<i>m</i> -Nitrotoluene	72.7	C ₈ H ₈ O ₂	<i>m</i> -Toluic acid	83.0
C ₇ H ₇ NO ₂	<i>p</i> -Nitrotoluene	73.3	C ₈ H ₈ O ₂	<i>p</i> -Toluic acid	82.4
C ₇ H ₈	Toluene	65.6	C ₈ H ₈ O ₂	Benzeneacetic acid	82.4
C ₇ H ₈ O	<i>o</i> -Cresol	73.3	C ₈ H ₈ O ₂	Methyl benzoate	81.6
C ₇ H ₈ O	<i>m</i> -Cresol	72.2	C ₈ H ₈ O ₃	Methyl salicylate	86.6
C ₇ H ₈ O	<i>p</i> -Cresol	72.4	C ₈ H ₁₀	Ethylbenzene	77.3
C ₇ H ₈ O	Benzyl alcohol	71.8	C ₈ H ₁₀	<i>o</i> -Xylene	77.7
C ₇ H ₈ O	Anisole	72.2	C ₈ H ₁₀	<i>m</i> -Xylene	76.4
C ₇ H ₉ N	<i>o</i> -Methylaniline	74.9	C ₈ H ₁₀	<i>p</i> -Xylene	77.0
C ₇ H ₉ N	<i>m</i> -Methylaniline	74.6	C ₈ H ₁₀ O	Phenetole	84.5
C ₇ H ₉ N	<i>p</i> -Methylaniline	72.5	C ₈ H ₁₁ N	<i>N</i> -Ethylaniline	85.6
C ₇ H ₉ N	<i>N</i> -Methylaniline	74.1	C ₈ H ₁₁ N	<i>N,N</i> -Dimethylaniline	85.1
C ₇ H ₉ N	2,4-Dimethylpyridine	71.3	C ₈ H ₁₁ N	2,4,6-Trimethylpyridine	83.1
C ₇ H ₉ N	2,6-Dimethylpyridine	72.5	C ₈ H ₁₄ O ₄	Ethyl succinate	105.0
C ₇ H ₉ NO	<i>o</i> -Methoxyaniline [<i>o</i> -Anisidine]	79.1	C ₈ H ₁₆	1-Octene	88.8
C ₇ H ₁₂ O ₄	Diethyl malonate	92.6	C ₈ H ₁₆	Cyclooctane	85.3
C ₇ H ₁₄	1-Heptene	77.8	C ₈ H ₁₆ O ₂	Octanoic acid	99.5
C ₇ H ₁₄	Cycloheptane	73.9	C ₈ H ₁₆ O ₂	Hexyl acetate	100.9
C ₇ H ₁₄	Methylcyclohexane	78.9	C ₈ H ₁₇ Cl	1-Chlorooctane	114.9
C ₇ H ₁₄ O	1-Heptanal	81.0	C ₈ H ₁₈	Octane	96.6
C ₇ H ₁₄ O	2-Heptanone	80.5	C ₈ H ₁₈	4-Methylheptane	97.3
C ₇ H ₁₄ O	3-Heptanone	80.7	C ₈ H ₁₈	3-Ethylhexane	97.8
C ₇ H ₁₄ O	4-Heptanone	80.5	C ₈ H ₁₈	3,4-Dimethylhexane	99.1
C ₇ H ₁₄ O	2,4-Dimethyl-3-pentanone	81.1	C ₈ H ₁₈	2,2,4-Trimethylpentane	99.1
C ₇ H ₁₄ O ₂	Heptanoic acid	89.0	C ₈ H ₁₈	2,3,4-Trimethylpentane	99.8
C ₇ H ₁₄ O ₂	Pentyl acetate	88.9	C ₈ H ₁₈ O	1-Octanol	101.6
C ₇ H ₁₄ O ₂	Isopentyl acetate	89.4	C ₈ H ₁₉ N	Dibutylamine	103.7
C ₇ H ₁₄ O ₂	Butyl propanoate	89.1	C ₉ H ₇ N	Quinoline	86.1
C ₇ H ₁₄ O ₂	Ethyl 3-methylbutanoate	91.1	C ₉ H ₇ N	Isoquinoline	83.9
C ₇ H ₁₆	Heptane	85.2	C ₉ H ₈	Indene	83
C ₇ H ₁₆	3-Ethylpentane	86.2	C ₉ H ₁₀	Isopropenylbenzene	80.0
C ₇ H ₁₆	2,2-Dimethylpentane	87.0	C ₉ H ₁₀ O ₂	Ethyl benzoate	93.8
C ₇ H ₁₆	2,3-Dimethylpentane	87.5	C ₉ H ₁₀ O ₂	Benzyl acetate	93.2
C ₇ H ₁₆	2,4-Dimethylpentane	87.5	C ₉ H ₁₂	Propylbenzene	89.1

Molecular formula	Compound	$-\chi_m/10^{-6} \text{ cm}^3 \text{ mol}^{-1}$	Molecular formula	Compound	$-\chi_m/10^{-6} \text{ cm}^3 \text{ mol}^{-1}$
C ₉ H ₁₂	Isopropylbenzene [Cumene]	89.5	C ₁₂ H ₉ N	Carbazole	119.9
C ₉ H ₁₂	1,3,5-Trimethylbenzene [Mesitylene]	92.3	C ₁₂ H ₁₀	Acenaphthene	109.9
C ₉ H ₁₈	1-Nonene	100.1	C ₁₂ H ₁₀	Biphenyl	103.3
C ₉ H ₁₈ O	2,6-Dimethyl-4-heptanone	104.3	C ₁₂ H ₁₀ N ₂	Azobenzene	106.8
C ₉ H ₂₀	Nonane	108.1	C ₁₂ H ₁₁ N	Diphenylamine	108.4
C ₁₀ H ₇ Br	1-Bromonaphthalene	123.6	C ₁₂ H ₁₄ O ₄	Diethyl phthalate	127.5
C ₁₀ H ₇ Cl	1-Chloronaphthalene	107.6	C ₁₂ H ₁₈	Hexamethylbenzene	122.5
C ₁₀ H ₈	Naphthalene	91.6	C ₁₂ H ₂₄ O ₂	Dodecanoic acid	113.0
C ₁₀ H ₈	Azulene	123.7	C ₁₃ H ₉ N	Acridine	118.8
C ₁₀ H ₈ O	1-Naphthol	96.2	C ₁₃ H ₁₀ O	Benzophenone	109.6
C ₁₀ H ₈ O	2-Naphthol	96.8	C ₁₃ H ₁₂	Diphenylmethane	116.0
C ₁₀ H ₉ N	1-Naphthalenamine	92.5	C ₁₃ H ₂₈	Tridecane	153.7
C ₁₀ H ₉ N	2-Naphthalenamine	98.0	C ₁₄ H ₈ O ₂	9,10-Anthracenedione	113.0
C ₁₀ H ₁₀ O ₂	Safrole	97.5	C ₁₄ H ₁₀	Anthracene	129.8
C ₁₀ H ₁₀ O ₄	Dimethyl terephthalate	101.6	C ₁₄ H ₁₀	Phenanthrene	127.6
C ₁₀ H ₁₄	Butylbenzene	100.7	C ₁₄ H ₁₀	Diphenylacetylene	116
C ₁₀ H ₁₄	<i>tert</i> -Butylbenzene	101.8	C ₁₄ H ₁₀ O ₂	Benzil	106.8
C ₁₀ H ₁₄	Isobutylbenzene	101.7	C ₁₄ H ₁₂ O ₂	Benzyl benzoate	132.2
C ₁₀ H ₁₄	<i>p</i> -Cymene	102.8	C ₁₄ H ₁₄	1,2-Diphenylethane	127.8
C ₁₀ H ₁₄	1,2,4,5-Tetramethylbenzene	101.2	C ₁₄ H ₂₈ O ₂	Tetradecanoic acid [Myristic acid]	176.0
C ₁₀ H ₁₄ O	<i>p-tert</i> -Butylphenol	108.0	C ₁₄ H ₃₀	Tetradecane	166.2
C ₁₀ H ₁₅ N	<i>N,N</i> -Diethylaniline	107.9	C ₁₆ H ₁₀	Pyrene	147
C ₁₀ H ₁₆	<i>d</i> -Limonene	98.0	C ₁₆ H ₃₂ O ₂	Hexadecanoic acid [Palmitic acid]	198.6
C ₁₀ H ₁₆	α -Pinene	100.7	C ₁₆ H ₃₄	Hexadecane	187.6
C ₁₀ H ₁₆	β -Pinene	101.9	C ₁₆ H ₃₄ O	1-Hexadecanol	183.5
C ₁₀ H ₁₆ O	Camphor, (+)	103.0	C ₁₈ H ₁₂	Chrysene	148.0
C ₁₀ H ₁₈	<i>cis</i> -Decahydronaphthalene	107.0	C ₁₈ H ₁₄	<i>o</i> -Terphenyl	150.4
C ₁₀ H ₁₈	<i>trans</i> -Decahydronaphthalene	107.6	C ₁₈ H ₁₄	<i>m</i> -Terphenyl	155.5
C ₁₀ H ₂₂	Decane	119.5	C ₁₈ H ₁₄	<i>p</i> -Terphenyl	156.0
C ₁₁ H ₁₀	1-Methylnaphthalene	102.9	C ₁₈ H ₃₄ O ₂	<i>cis</i> -9-Octadecenoic acid [Oleic acid]	208.5
C ₁₁ H ₁₀	2-Methylnaphthalene	102.7	C ₁₈ H ₃₆ O ₂	Octadecanoic acid [Stearic acid]	220.8
C ₁₁ H ₂₄	Undecane	131.8	C ₂₀ H ₁₂	Perylene	167.5
C ₁₂ H ₈	Acenaphthylene	111.6			