

1677
MW

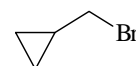
C₄H₇Br

(Bromomethyl)cyclopropane

C_s (*cis*)
C₁ (*gauche*)

| r_g | \AA^a |
|------------|--------------------------|
| C–C (ring) | 1.514 ^{b)} |
| C–H (ring) | 1.082 ^{b)} |
| C(4)–H | 1.091 ^{b)} |
| | <i>gauche</i> <i>cis</i> |
| C(4)–C(1) | 1.522(10) 1.443(10) |
| C(4)–Br | 1.933(10) 1.816(10) |

| θ_a | deg ^{a)} |
|-------------------------|------------------------------|
| C(1)–C(2,3)–C | 60 ^{b)} |
| H–C(2,3)–H | 116 ^{b)} |
| C(1)–C(4)–H | 109.45 ^{b)} |
| | <i>gauche</i> <i>cis</i> |
| C(1)–C(4)–Br | 109.6(10) 129.1(10) |
| φ ^{c)} | 122.5(10) 127.2(10) |
| τ ^{d)} | 122.4(30) 0 ^{b)} |

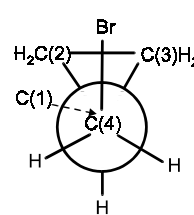


^{a)} Uncertainties were not estimated in the original paper.

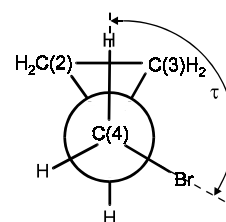
^{b)} Assumed.

^{c)} Angle between the ring plane and the C(1)–C(4) bond.

^{d)} Torsional angle around the C(1)–C(4) bond, see figure.



cis



gauche

Mohammadi, M.A., Brooks, W.V.F.: J. Mol. Spectrosc. **77** (1979) 42.