



Genipin is an aglycone derived from an iridoid glycoside called geniposide present in fruit of *Gardenia jasminoides* Ellis.

Genipin is an excellent natural cross-linker for proteins, collagen, gelatin, and chitosan cross-linking.

It has a low acute toxicity, with LD50 i.v. 382 mg/kg in mice, therefore, much less toxic than glutaraldehyde and many other commonly used synthetic cross-linking reagents. It is also used for pharmaceutical purposes, such as choleric action for liver diseases control.

Genipin is available for small and large scale production.



[Order online](#)

| | | | |
|-------------------|--|------------------------------------|----------------------------|
| Product ID | ST080860 | | |
| IUPAC name | Methyl (| 1 <i>R</i> ,2 <i>R</i> ,6 <i>S</i> |)-2-hydroxy-9-(hydroxymeth |
| Identifiers | | | |
| CAS number | [6902-77-8] | | |
| PubChem | 442424 | | |
| SMILES | COC(=O)C1=CO[C@H]([C@H]2[C@@H]1CC=C2CO)O | | |
| Properties | | | |
| Molecular formula | C | 11 | H 14 |
| Molar mass | 226.226 g/mol | | |

| | |
|--------------------------|------|
| Hydrogen Bonds Donors | |
| 2 | |
| Hydrogen Bonds Acceptors | 5 |
| Rotatable Bonds | |
| 3 | |
| Polar Surface Area | |
| 76 | |
| XLogP | -0.8 |
| Exact Mass | |
| 226.084 | |
| Monoisotopic Mass | |
| 226.084 | |
| Charge | |
| 0 | |
| Complexity | |
| 35 | |

Genipin Specification

| | Specification | Results |
|--------------------|--|-----------|
| Appearance: | white crystal powder | |
| Purity: | 98% up by HPLC method | 98.2% |
| Solubilities: | soluble in Ethanol, Methanol, Acetone, slightly soluble in water | |
| Total plate count: | below 1000 CFU/g | 300 CFU/g |
| E. coli: | Negative | Negative |
| Salmonella: | Negative | Negative |
| Storage: | Room temperature | |

Notice: It can be dissolved in Ethanol first, then diluted to suitable concentration with buffer solution.