

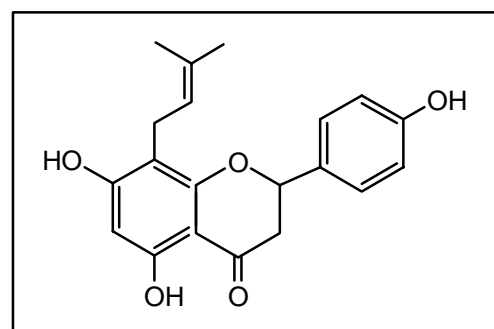
for several pharmaceutical applications.

## 8-Prenylnaringenin (8-PN)

### ❖ Overview

- **8-PN** is a natural product produced by the hop plant.
- **8-PN** is the most potent phytoestrogen to date discovered in hops.
- **8-PN** is being studied by Universities and research facilities around the world

### Molecular Structure of 8-Prenylnaringenin



### ❖ Specification

- **Description:** A white colored powder.
- **Concentration:** > 90% 8-Prenylnaringenin by HPLC
- **Ethanol, Ethylacetate** < 0.1% by GC
- **Density:** ~0.5 g/ml
- **Solubility:** Very soluble in ethanol, nearly insoluble in water.

## ❖ Packaging

**8-PN** is packaged in various types of containers depending on custom requirements.

### ❑ Storage stability:

**8-PN** is stable for two years from the date of production. The product should be stored < 5 °C and be protected from light.

### ❑ Safety:

**8-PN** is classified in GHS category 5. If Xantho-Flav Pure comes in contact with the eyes wash off with plenty of water and seek medical attention. For full safety information please see the relevant Steiner material safety data sheet.

### ❑ Quality:

All Hopsteiner® products are produced in plants accredited to internationally accepted quality standards.

## Analytical methods

### ❑ Concentration of 8-PN in Product:

The concentration of **8-PN** can be determined by HPLC using modified method Analytica-EBC 7.8 with UV detection at 370 nm or 290 nm for isoxanthohumol. The recommended procedures can be obtained from Steiner.

## ❖ Technical Support

We will be pleased to offer help and advice on the full range of Hopsteiner® products:

- ❑ Copies of all relevant analytical procedures
- ❑ Material Safety Data Sheets (MSDS)
- ❑ Assistance with pilot or commercial trials
- ❑ Specialist analytical services

## ❑ Physiological Properties

8-Prenylnaringenin has been identified as a phytoestrogen with strong estrogen receptor-alpha activity in "in-vitro"-tests.

### ❑ Orac Test Results:

#### Peroxy Radical Scavenging Capacity

|                            | <u>µmol Trolox/g</u> |
|----------------------------|----------------------|
| 8-Prenylnaringenin         | 29390                |
| Xanthohumol (> 98%)        | 23447                |
| Isoxanthohumol (> 98%)     | 19073                |
| *Quercetin-Dihydrate (90%) | 21779                |

#### Hydroxyl Radical Scavenging Capacity

|                            | <u>µmol Trolox/g</u> |
|----------------------------|----------------------|
| 8-Prenylnaringenin         | 32639                |
| Xanthohumol (> 98%)        | 72245                |
| Isoxanthohumol (> 98%)     | 29600                |
| *Quercetin-Dihydrate (90%) | 5610                 |

\*Quercetin-Dihydrate (90%) was used as a reference standard.

Rev. 7.24.09