

# PRODUCT INFORMATION



## 15(R)-17-phenyl trinor Prostaglandin F<sub>2α</sub> ethyl amide

Item No. 10008127

CAS Registry No.: 1163135-92-9

Formal Name: N-ethyl-9 $\alpha$ ,11 $\alpha$ ,15R-trihydroxy-17-phenyl-18,19,20-trinor-prosta-5Z,13E-dien-1-amide

Synonyms: 15(R)-Bimatoprost, 15(R)-17-phenyl trinor PGF<sub>2 $\alpha$</sub>  ethyl amide

MF: C<sub>25</sub>H<sub>37</sub>NO<sub>4</sub>

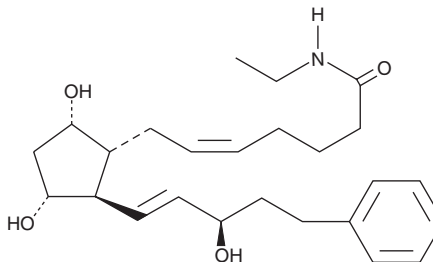
FW: 415.6

Purity:  $\geq$ 98%

Supplied as: A solution in methyl acetate

Storage: -20°C

Stability:  $\geq$ 2 years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

### Laboratory Procedures

15(R)-17-phenyl trinor Prostaglandin F<sub>2 $\alpha$</sub>  (PGF<sub>2 $\alpha$</sub> ) ethyl amide as a solution in methyl acetate. To change the solvent, simply evaporate the methyl acetate under a gentle stream of nitrogen and immediately add the solvent of choice. Solvents such as ethanol, DMSO, dimethyl formamide (DMF), and acetonitrile purged with an inert gas can be used. The solubility of 15(R)-17-phenyl trinor PGF<sub>2 $\alpha$</sub>  ethyl amide in ethanol is approximately 30 mg/ml, approximately 25 mg/ml DMSO and DMF, and approximately 3 mg/ml in acetonitrile.

Further dilutions of the stock solution into aqueous buffers or isotonic saline should be made prior to performing biological experiments. Ensure that the residual amount of organic solvent is insignificant, since organic solvents may have physiological effects at low concentrations. If an organic solvent-free solution of 15(R)-17-phenyl trinor PGF<sub>2 $\alpha$</sub>  ethyl amide is needed, it can be prepared by evaporating the methyl acetate and directly dissolving the neat oil in aqueous buffers. The solubility of 15(R)-17-phenyl trinor PGF<sub>2 $\alpha$</sub>  ethyl amide in PBS, pH 7.2, is approximately 0.3 mg/ml. We do not recommend storing the aqueous solution for more than one day.

### Description

17-phenyl trinor PGF<sub>2 $\alpha$</sub>  ethyl amide is an analog of PGF<sub>2 $\alpha$</sub>  that is used topically for the treatment of glaucoma and ocular hypertension. 15(R)-17-phenyl trinor PGF<sub>2 $\alpha$</sub>  ethyl amide is an isomer of 17-phenyl trinor PGF<sub>2 $\alpha$</sub>  ethyl amide, characterized by an inverted ( $\beta$ ) hydroxyl group at C-15. While this isomer has not been characterized, the comparable inversion of 15-hydroxyl groups, from (S) to (R), on other PGF<sub>2 $\alpha$</sub>  analogs typically decreases, but does not eliminate activity.<sup>1</sup>

### References

1. Resul, B., Stjerschantz, J., No, K., *et al.* Phenyl-substituted prostaglandins: Potent and selective anti-glaucoma agents. *J. Med. Chem.* **36**, 243-248 (1993).

#### WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

#### SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the complete Safety Data Sheet, which has been sent via email to your institution.

#### WARRANTY AND LIMITATION OF REMEDY

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