



>>Entry Name: Fertirelin, BAN, INN

Synonym(s): 9-(N-Ethyl-L-prolinamide)-10-deglycinamide luteinizing hormone-releasing factor (pig), 9Cl. Conceral. Fertiral. TAP 031. U 69689

CAS Registry Number: 38234-21-8

5-Oxo-Pro-His-Trp-Ser-Tyr-Gly-Leu-Arg-ProNH₂

Molecular Formula: C₅₅H₇₆N₁₆O₁₂

Molecular Weight: 1153.305

Accurate Mass: 1152.582864

Percentage Composition: C 57.28%; H 6.64%; N 19.43%; O 16.65%

Use/Importance: Deriv. of gonadotrophin-releasing hormone (LH-RH). Luteinizing and follicle-stimulating hormone-releasing factor, a hypothalamic hormone; used to treat hormonal insufficiency and infertility in women

Melting Point: Mp 159-160°

Optical Rotation: $[\alpha]_{\text{D}}^{25} -25$ (c, 1 in AcOH)

Sigma: L0262

>>Derivative: Acetate salt (1:1)

Synonym(s): Fertirelin acetate, USAN

Physical Description: Cryst. + 5H₂O

Optical Rotation: $[\alpha]_{\text{D}}^{25} -53.6$ (c, 0.5 in 5% AcOH)

References:

- Arnold, W. *et al.*, *J. Med. Chem.*, 1974, **17**, 314, (*synth, pharmacol, tlc, nmr*)
Shinagawa, S. *et al.*, *Chem. Pharm. Bull.*, 1975, **23**, 229, (*synth, pharmacol*)
Deslauriers, R. *et al.*, *Eur. J. Biochem.*, 1977, **75**, 343, (*cmr, conformn*)
Fujino, M. *et al.*, *Chem. Comm.*, 1980, 668, (*synth*)
Yamazaki, I., *Int. Congr. Ser. Excerpta Med.*, 1984, **656**, 77, (*rev, pharmacol*)
Hartman, P.A. *et al.*, *J. Chromatogr.*, 1988, **444**, 177, (*hplc*)