# PRODUCT INFORMATION



# L,L-Dityrosine

Item No. 35746

CAS Registry No.: 63442-81-9

Formal Name:  $\alpha^3$ S, $\alpha^3$ 'S-diamino-6,6'-dihydroxy-

[1,1'-biphenyl]-3,3'-dipropanoic acid

MF:  $C_{18}H_{20}N_2O_6$ 

FW: 360.4 **Purity:** ≥90%

Supplied as: A solution in ethanol

-20°C Storage: Stability: ≥2 years

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

 $NH_2$ 

# Description

L,L-Dityrosine is an amino acid conjugate containing two L-tyrosine molecules. L-Tyrosine residues in fibrinogen proteins can form L,L-dityrosine cross-links between fibrinogen proteins in the presence of hematin and plasma-generated hydrogen peroxide under non-thermal plasma exposure. L-Tyrosine residues in human, but not mouse, amylin peptides can form L,L-dityrosine cross-links between amylin peptides in the presence of copper (II) ions and hydrogen peroxide.<sup>2</sup>

## References

- 1. Ke, Z. and Huang, Q. Haem-assisted dityrosine-cross-linking of fibrinogen under non-thermal plasma exposure: One important mechanism of facilitated blood coagulation. Sci. Rep. 6, 26982 (2016).
- 2. Dong, X., Svantesson, T., Sholts, S.B., et al. Copper ions induce dityrosine-linked dimers in human but not in murine islet amyloid polypeptide (IAPP/amylin). Biochem. Biophys. Res. Commun. 510(4), 520-524 (2019).

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

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.

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