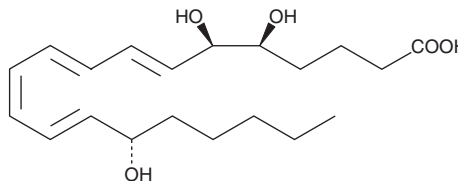


# PRODUCT INFORMATION



## Lipoxin A<sub>4</sub> Item No. 90410

**CAS Registry No.:** 89663-86-5  
**Formal Name:** 5S,6R,15S-trihydroxy-7E,9E,11Z,13E-eicosatetraenoic acid  
**Synonyms:** LXA<sub>4</sub>, 5(S),6(R),15(S)-TriHETE  
**MF:** C<sub>20</sub>H<sub>32</sub>O<sub>5</sub>  
**FW:** 352.5  
**Purity:** ≥95%  
**UV/Vis.:** λ<sub>max</sub>: 302 nm ε: 50,000  
**Supplied as:** A solution in ethanol  
**Storage:** -80°C  
**Stability:** ≥1 year  
**Special Conditions:** Light Sensitive



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

### Laboratory Procedures

Lipoxin A<sub>4</sub> (LXA<sub>4</sub>) is supplied as a solution in ethanol. To change the solvent, simply evaporate the LXA<sub>4</sub> under a gentle stream of nitrogen and immediately add the solvent of choice. Solvents such as ethanol and dimethyl formamide purged with an inert gas can be used. The solubility of LXA<sub>4</sub> in these solvents is approximately 50 mg/ml.

LXA<sub>4</sub> is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, the LXA<sub>4</sub> solution of ethanol should be diluted with the aqueous buffer of choice. The solubility of LXA<sub>4</sub> in PBS (pH 7.2) is approximately 1 mg/ml. We do not recommend storing the aqueous solution for more than one day.

### Description

LXA<sub>4</sub> is a trihydroxy fatty acid containing a conjugated tetraene, produced by the metabolism of (±)15-HETE (Item No. 34700) or 15-HpETE with human leukocytes.<sup>1</sup> LXA<sub>4</sub> is equipotent to leukotriene B<sub>4</sub> (Item No. 20110) in inducing superoxide generation in human neutrophils at 0.1 μM.<sup>2</sup> LXA<sub>4</sub> is associated with several other biological functions including leukocyte activation, chemotaxis effects, natural killer cell inhibition, and monocyte migration and adhesion.<sup>2-4</sup>

### References

1. Serhan, C.N., Nicolaou, K.C., Webber, S.E., *et al.* Lipoxin A. Stereochemistry and biosynthesis. *J. Biol. Chem.* **261**, 16340-16345 (1986).
2. Serhan, C.N., Hamberg, M., and Samuelsson, B. Lipoxins: Novel series of biologically active compounds formed from arachidonic acid in human leukocytes. *Proc. Natl. Acad. Sci. USA* **81**, 5335-5339 (1984).
3. Ramstedt, U., Serhan, C.N., Nicolaou, K.C., *et al.* Lipoxin A-induced inhibition of human natural killer cell cytotoxicity: Studies on stereospecificity of inhibition and mode of action. *J. Immunol.* **138**, 266-270 (1987).
4. Maddox, J.F. and Serhan, C.N. Lipoxin A<sub>4</sub> and B<sub>4</sub> are potent stimuli for human monocyte migration and adhesion: Selective inactivation by dehydrogenation and reduction. *J. Exp. Med.* **183**, 137-146 (1996).

#### 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.

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