



# SZABO SCANDIC

Part of Europa Biosite

## Produktinformation



Forschungsprodukte & Biochemikalien



Zellkultur & Verbrauchsmaterial



Diagnostik & molekulare Diagnostik



Laborgeräte & Service

Weitere Information auf den folgenden Seiten!  
See the following pages for more information!



### Lieferung & Zahlungsart

siehe unsere [Liefer- und Versandbedingungen](#)

### Zuschläge

- Mindermengenzuschlag
- Trockeneiszuschlag
- Gefahrgutzuschlag
- Expressversand

### SZABO-SCANDIC HandelsgmbH

Quellenstraße 110, A-1100 Wien

T. +43(0)1 489 3961-0

F. +43(0)1 489 3961-7

[mail@szabo-scandic.com](mailto:mail@szabo-scandic.com)

[www.szabo-scandic.com](http://www.szabo-scandic.com)

[linkedin.com/company/szaboscandic](https://www.linkedin.com/company/szaboscandic) 

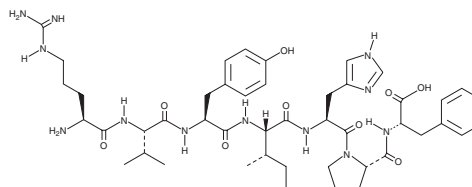
# PRODUCT INFORMATION



## Angiotensin III (human, mouse)

Item No. 21618

**CAS Registry No.:** 13602-53-4  
**Formal Name:** 5-L-isoleucine-2-8-angiotensin II  
**MF:** C<sub>46</sub>H<sub>66</sub>N<sub>12</sub>O<sub>9</sub>  
**FW:** 931.1  
**Purity:** ≥98%  
**Supplied as:** A crystalline solid  
**Storage:** -20°C  
**Stability:** As supplied, 2 years from the QC date provided on the Certificate of Analysis, when stored properly



### Laboratory Procedures

Angiotensin III (Ang III) (human, mouse) is supplied as a crystalline solid. Aqueous solutions of Ang III (human, mouse) can be prepared by directly dissolving the crystalline solid in aqueous buffers. The solubility of Ang III (human, mouse) in PBS, pH 7.2, is approximately 1 mg/ml. We do not recommend storing the aqueous solution for more than one day.

### Description

Ang III is a heptapeptide agonist at the angiotensin 1 (AT<sub>1</sub>) and AT<sub>2</sub> receptors, with a 30-fold higher affinity for AT<sub>2</sub> compared with AT<sub>1</sub> in HEK293 cells.<sup>1,2</sup> Ang III is the preferred agonist for renal AT<sub>2</sub> receptors, which are responsible for sodium excretion into the urine.<sup>3</sup> Ang III induces the same level of aldosterone synthesis as Ang II but has lower vasoconstrictive activity *in vivo*.<sup>4</sup> In the brain renin-angiotensin system, Ang III increases sympathetic nerve activity and vasopressin release and dampens the baroreflex leading to higher blood pressure.<sup>5</sup>

### References

1. Bosnyak, S., Jones, E.S., Christopoulos, A., *et al.* Relative affinity of angiotensin peptides and novel ligands at AT<sub>1</sub> and AT<sub>2</sub> receptors. *Clin. Sci. (Lond.)* **121(7)**, 297-303 (2011).
2. Wright, J.W. and Harding, J.W. Brain renin-angiotensin--a new look at an old system. *Prog. Neurobiol.* **95(1)**, 49-67 (2011).
3. Kemp, B.A., Bell, J.F., Rottkamp, D.M., *et al.* Intrarenal angiotensin III is the predominant agonist for proximal tubule angiotensin type 2 receptors. *Hypertension* **60(2)**, 387-395 (2012).
4. Blair-West, J.R., Coghlan, J.P., Denton, D.A., *et al.* A dose-response comparison of the actions of angiotensin II and angiotensin III in sheep. *J. Endocrinol.* **87(3)**, 409-417 (1980).
5. Gao, J., Marc, Y., Iturrioz, X., *et al.* A new strategy for treating hypertension by blocking the activity of the brain renin-angiotensin system with aminopeptidase A inhibitors. *Clin. Sci. (Lond.)* **127(3)**, 135-148 (2014).

#### 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

Buyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website.

Copyright Cayman Chemical Company, 04/17/2017

#### CAYMAN CHEMICAL

1180 EAST ELLSWORTH RD  
ANN ARBOR, MI 48108 · USA

**PHONE:** [800] 364-9897  
[734] 971-3335

**FAX:** [734] 971-3640

CUSTSERV@CAYMANCHEM.COM  
WWW.CAYMANCHEM.COM