

SUPPLEMENTARY DATA FOR:

Convergent Synthesis of Thioether Containing Peptides

Spyridon Mourtas ^{1,2}, Christina Katakalous ¹, Dimitrios Gatos ¹ and Kleomenis Barlos ^{1,3,*}

¹ Department of Chemistry, University of Patras, 26510 Rio Patras, Greece; s.mourtas@upatras.gr (S.M.); c.katakalous@yahoo.gr (C.K.); d.gatos@upatras.gr (D.G.)

² Institute of Chemical Engineering Sciences of the Foundation for Research and Technology Hellas (FORTH/IEC-HT), 26504 Rio Patras, Greece

³ CBL-Patras, Patras Industrial Area, Block 1, 25018 Patras, Greece.

* Correspondence: barlos@cblpatras.gr; Tel.: +30-2610-647600; Fax: +30-2610-647316.

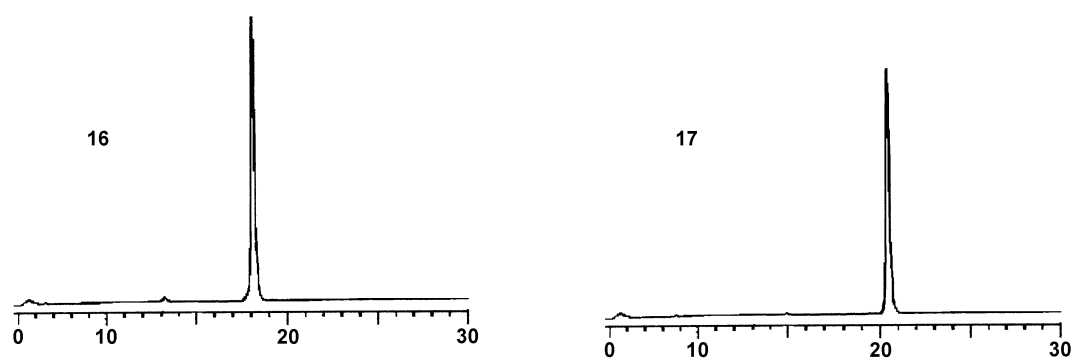


Figure S1. Analytical hplc of thioether containing peptides **16** and **17**; Column: Lichrosphere RP-8, 5 μ m, 4 \times 150 mm; flow rate: 1 mL/min; gradient: from 20 to 100% acetonitrile in water within 30 min; detection at 265 nm.

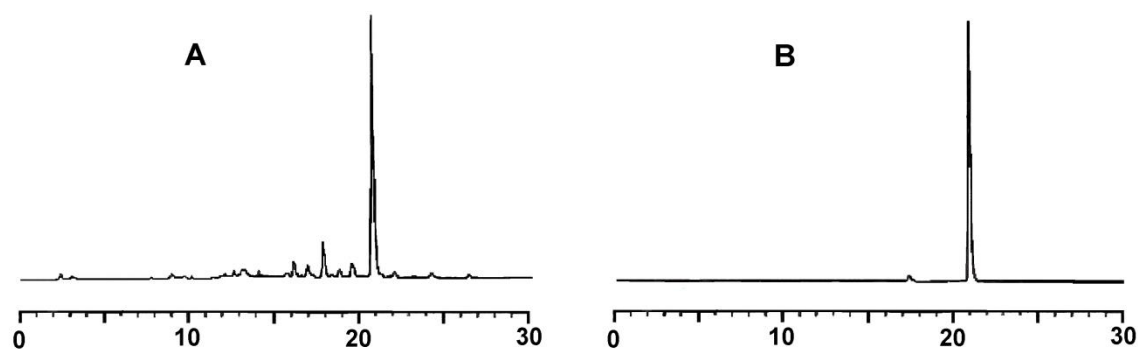


Figure S2. Analytical hplc of Fmoc-Leu-alaninothiol prepared by coupling of Fmoc-Leu-OH on the Trt-resin **19** ($m = 1$; $R' = CH_3$) and subsequent cleavage by DTT (A) and TES (B); Column: Nucleosil C8, 7 μ m, 4 \times 125 mm; flow rate: 1 mL/min; gradient: from 50 to 100% acetonitrile in water within 30 min; detection at 265 nm.

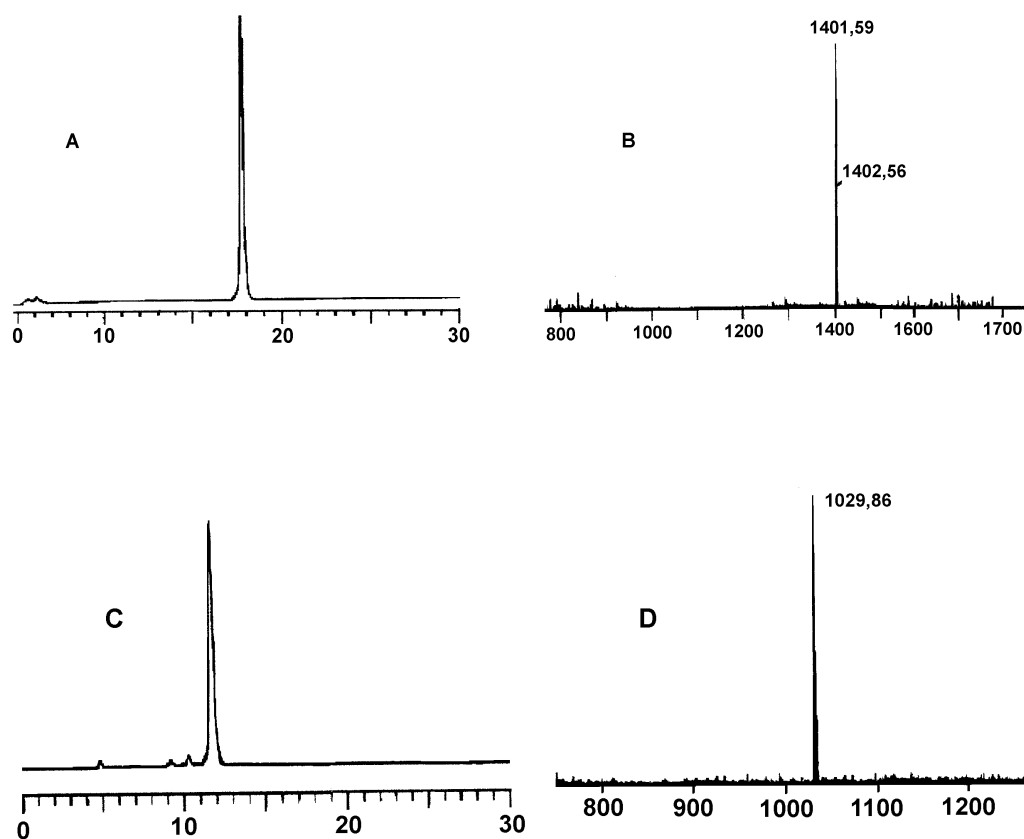


Figure S3. Analytical hplc (A) and ESI-MS analysis (B) of thiol-peptide **21** (ProTa (69-75) derivative), and analytical hplc (C) and ESI-MS analysis (D) of thiol-peptide **22** (Hir (11-18) derivative), synthesized on Trt-resin **19** ($R' = \text{CH}_3$ (**21**); $-\text{CH}_2\text{-Ph}$ (**22**)); Column: Nucleosil C8, 7 μm , 4 \times 125 mm; flow rate: 1 mL/min; gradient: from 50 to 100% acetonitrile in water within 30 min; detection at 265 nm.

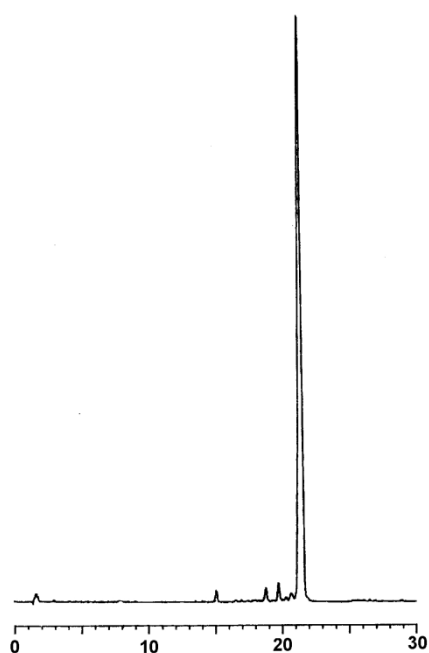


Figure S4. Analytical hplc of **26**; Column: Nucleosil C8, 7 μm , 4 \times 125 mm; flow rate: 1 mL/min; gradient: from 50 to 100% acetonitrile in water within 30 min; detection at 265 nm.

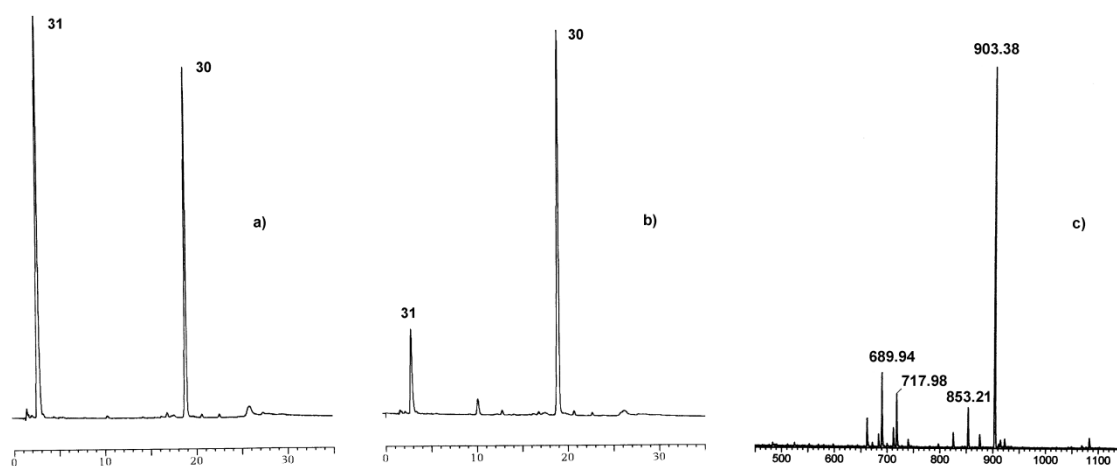


Figure S5. Analytical hplc during reaction of **27** and **28** at 2 h (a) and 24 h (b). The reaction process was monitored by following the peaks of the desired product **30** and the un-reacted **31** after their cleavage from resin; Column: Nucleosil C8, 7 μm , 4 \times 125 mm; flow rate: 1 mL/min; gradient: from 50 to 100% acetonitrile in water within 30 min; detection at 265 nm; ESI-MS analysis of **30** (c).