



**Professor Anthony Davis**  
**M.A., D.Phil.(Oxon.), FRSC**

Professor of Supramolecular Chemistry

Office N406  
School of Chemistry,  
Cantock's Close, Bristol BS8 1TS  
([See a map](#))

+44 (0) 117 954 6334  
[anthony.davis@bristol.ac.uk](mailto:anthony.davis@bristol.ac.uk)

## Summary

Current research interests include; supramolecular Chemistry, carbohydrate recognition, anion recognition and transport; crystal engineering, computer-aided molecular design.

Professor Davis is a supervisor in the [EPSRC Centre for Doctoral Training in Chemical Synthesis](#)

## Biography

Tony Davis gained a B.A. in Chemistry from Oxford University in 1977, then stayed on for a D.Phil. under Dr. G. H. Whitam and two years' postdoctoral work with Prof. J. E. Baldwin. In 1981 he moved to the ETH Zürich as a Royal Society European Exchange Fellow working with Prof. A. Eschenmoser, then in 1982 was appointed as a Lecturer in Organic Chemistry at Trinity College, Dublin. In September 2000 he moved to the University of Bristol, where he is Professor of Supramolecular Chemistry in the School of Chemistry.

## Keywords

- Supramolecular Chemistry
- Carbohydrate Recognition
- Anion Recognition and Transport
- Crystal Engineering
- Computer-Aided Molecular Design

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- [Organic and Biological Chemistry](#)

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## Recent publications

- Tromans, RA, Carter, TS, Chabanne, L, Crump, MP, Li, H, Matlock, JV, Orchard, MG & Davis, AP, 2019, '[A biomimetic receptor for glucose](#)'. *Nature Chemistry*, vol 11., pp. 52-56
- Grauwels, G, Valkenier, H, Davis, AP, Jabin, I & Bartik, K, 2019, '[Repositioning Chloride Transmembrane Transporters: Transport of Organic Ion Pairs](#)'. *Angewandte Chemie - International Edition*, vol 58., pp. 6921-6925
- Grauwels, G, Valkenier, H, Davis, AP, Jabin, I & Bartik, K, 2019, '[Repositioning Chloride Transmembrane Transporters: Transport of Organic Ion Pairs](#)'. *Angewandte Chemie*, vol 131., pp. 6995-6999
- Sheppard, DN & Davis, AP, 2019, '[Pore-forming small molecules offer a promising way to tackle cystic fibrosis](#)'. *Nature*, vol 567., pp. 315-317
- Dias, CM, Li, H, Valkenier, H, Karagiannidis, LE, Gale, PA, Sheppard, DN & Davis, AP, 2018, '[Anion transport by ortho-phenylene bis-ureas across cell and vesicle membranes](#)'. *Organic and Biomolecular Chemistry*, vol 16., pp. 1083-1087
- Juránek, O, Valkenier, H, Puttreddy, R, Novák, M, Sparkes, HA, Marek, R, Rissanen, K & Davis, AP, 2018, '[Anion recognition by a bioactive diureidodecalin anionophore: solid-state, solution, and computational studies](#)'. *Chemistry - A European Journal*, vol 24., pp. 8178-8185
- Dias, CM, Valkenier, H & Davis, AP, 2018, '[Anthracene Bisureas as Powerful and Accessible Anion Carriers](#)'. *Chemistry - A European Journal*, vol 24., pp. 6262-6268
- Ríos, P, Mooibroek, TJ, Carter, TS, Williams, C, Wilson, MR, Crump, MP & Davis, AP, 2017, '[Enantioselective carbohydrate recognition by synthetic lectins in water](#)'. *Chemical Science*, vol 8., pp. 4056-4061
- Valkenier, H, Dias, CM, Butts, CP & Davis, AP, 2017, '[A folding decalin tetra-urea for transmembrane anion transport](#)'. *Tetrahedron*, vol 73., pp. 4955-4962
- Mandal, PK, Kauffmann, B, Destecroix, H, Ferrand, YJM, Davis, AP & Huc, I, 2016, '[Crystal structure of a complex between  \$\beta\$ -glucopyranose and a macrocyclic receptor with dendritic multicharged water solubilizing chains](#)'. *Chemical Communications*, vol 52., pp. 9355-9358
- Li, H, Valkenier, H, Judd, LW, Brotherhood, PR, Hussain, S, Cooper, JA, Juránek, O, Sparkes, HA, Sheppard, DN & Davis, AP, 2016, '[Efficient, non-toxic anion transport by synthetic carriers in cells and epithelia](#)'. *Nature Chemistry*, vol 8., pp. 24-32
- Mooibroek, TJ, Crump, MP & Davis, A, 2016, '[Synthesis and evaluation of a desymmetrised synthetic lectin: An approach to carbohydrate receptors with improved versatility](#)'. *Organic and Biomolecular Chemistry*, vol 14., pp. 1930-1933

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