Gordon research conference program

Bioorganic chemistry
June 15–20, 1997
Proctor Academy, NH
John Griffin and Anthony Czarnik, Chairs

Drug resistance, targets and strategies
Richard Thompson (*Eli Lilly*), Carolyn Bertozzi (*UC Berkeley*), Discussion leaders

Stuart Levy (*Tufts*):
Problems and opportunities presented by antibiotic-resistant microbes

Dudley Williams (*Cambridge*):
Glycopeptide antibiotics: structures and mode of action

Dan Littman (*Skirball Institute, NYU*):
Interactions of HIV envelopes with chemokine receptors

David van Vranken (*UC Irvine*):
New enzyme inhibitors and peptide mimetics

Shahriar Mobashery (*Wayne State*):
Evolution of the versatile β-lactam hydrolase activity: from biosynthetic enzymes to drug resistance factors

Kevin Judice (*Genentech*):
Small-molecule inhibitors of protein–protein binding interactions

Molecular diversity
Alan Schwabacher (*Wisconsin–Milwaukee*), Discussion leader

Stephen Kaldor (*Eli Lilly*):
New combinatorial chemistry methods for pharmaceutical lead generation and optimization

Jeremy Minshull (*Maxygen*):
Functional evolution of enzymes and pathways by DNA shuffling

Klaus Gubernator (*Roche Basel*):
3D-structure guided evolutionary discovery of bioactive molecules

New methods
Richard Cummings (*Merck*), Discussion leader

Joe Loo (*Parke-Davis*):
Using mass spectrometry to study protein–DNA/RNA interactions

Yen-Ho Chu (*Ohio State*):
Affinity capillary electrophoresis

Robert Flowers (*Toledo*):
Calorimetric investigations of biologically relevant reaction mechanisms

Peter Schuck (*NIH*):
Determination of binding affinity and kinetics using evanescent wave biosensors

Nucleic acids and genomics
Christine Chow (*Wayner State*), Discussion leader

Brian Metcalfe (*SmithKline Beecham*):
The impact of genomics on bioorganic chemistry

Paul Schimmel (*MIT*):
RNA-dependent amino acid recognition in translational editing

Hiroshi Sugiyama (*Tokyo*):
Molecular basis of atom-specific DNA modification

Enzymes and mechanisms
K. Shokat (*Princeton*), P. Petillo (*Illinois*), Discussion leaders

Alan Fersht (*Cambridge*):
Protein folding

Dale Drueckhammer (*Stanford*):
Coenzyme A analogs as probes of enzyme-catalyzed reactions

Ron Raines (*Wisconsin*):
Catalysis of oxidative protein folding *in vitro* and *in vivo*

Ikuo Fujii (*Osaka*):
Evolving catalytic antibodies in phage-displayed combinatorial libraries

Recognition and mimesis

T. Wandless (*Stanford*), B. Carter (*Toledo*), Discussion leader

Carlos Barbas (*Scripps*):
Structure and mechanism of aldolase catalytic antibodies: programming covalent catalysis

Kurt Deshayes (*Bowling Green*):
Using host–guest chemistry to separate rates of energy transfer from the rate of diffusion

Linda Jolliffe (*Johnson & Johnson*):
Progress towards development of small molecule mimetics of erythropoietin

Lia Addadi (*Weizmann Institute*):
Antibody recognition of molecular organization at specific crystal surfaces

Marc Snapper (*Boston College*):
Ilimaquinone: A new tool for probing intracellular vesicular trafficking

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Plan now to attend. Look for applications material and guidelines in the February issue of Science featuring the 1997 Summer Gordon Conference. Applications may also be submitted via the GRC web site: http://www.grc.uri.edu. For further information, please contact:

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