

## **P.K. YEUNG**

School of Aerospace Engineering  
Georgia Institute of Technology, Atlanta, GA 30332-0150

### **EDUCATION:**

PhD. in Mechanical Engineering, Cornell University, 1989 (advisor: S.B. Pope)  
M.Phil in Mechanical Engineering, University of Hong Kong, 1984  
B.Sc.(Eng). in Mechanical Engineering, University of Hong Kong, 1984

### **PROFESSIONAL EXPERIENCE:**

1998-present Associate Professor of Aerospace Engineering, Georgia Tech  
1992-1998 Assistant Professor of Aerospace Engineering, Georgia Tech  
1996,7,8 Research Visitor, CSIRO Atmospheric Research, Australia  
1994,5,6 Short-term Visiting Scientist, ICASE, NASA Langley Research Center

### **GRADUATE ADVISING:**

Ph.D. students graduated: P. Shen, P. Vedula  
Current Ph.D and M.S. students: S. Xu, D. Donzis

### **CURRENT RESEARCH SUPPORT:**

National Science Foundation (CTS-0121030 and 0328314)  
San Diego Supercomputer Center Pittsburgh Supercomputer Center, and DoE Office of Science NERSC supercomputing facility

### **OTHER COLLABORATORS** (in past 48 months):

In US: R.O. Fox, R.D. Moser, S.B. Pope, B.J. Rothschild, K.R. Sreenivasan  
International: M.S. Borgas (Australia), B.L. Sawford (Australia), J. Schumacher (Germany), A. Tsinober (Israel)

### **SYNERGISTIC ACTIVITIES**

Member of Task Force on Physicists with Disabilities, American Physical Society (2000-01); reviewer for various journals and sponsor agencies, including NSF

### **SELECTED PUBLICATIONS**

1. P. Vedula, P.K. Yeung and R.O. Fox, "Dynamics of scalar dissipation in isotropic turbulence: a numerical and modeling study," *J. Fluid Mech.* **433**, 29-60 (2001).
2. P.K. Yeung, "Lagrangian characteristics of turbulence and scalar transport in direct numerical simulations," *J. Fluid Mech.* **427**, 241-274 (2001).
3. P.K. Yeung, "Lagrangian investigations of turbulence," *Annu. Rev. Fluid Mech.* **34**, 115-142 (2002).
4. P.K. Yeung, S. Xu and K.R. Sreenivasan, "Schmidt number effects on turbulent transport with uniform mean scalar gradient," *Phys. Fluids* **14**, 4178-4191 (2002).
5. B.L. Sawford, P.K. Yeung, M.S. Borgas, P. Vedula, A. LaPorta, A.M. Crawford, and E. Bodenschatz, "Conditional and unconditional acceleration statistics in turbulence," *Phys. Fluids* **15**, 3478-3489 (2003).