**Isaac Kaminer**

Professor

Department of Mechanical and Aerospace Engineering

Naval Postgraduate School

Monterey, CA 93943

**Education:**

* B.S. Electrical Engineering, University of Minnesota, August 1983
* M.S. Electrical Engineering, University of Minnesota, August 1985
* Ph.D. Electrical Engineering Systems, University of Michigan, December 1992

**Professional Experience:**

**9/85 – 8/89** Senior Engineer, 757/767 Flight Management Computer Group Boeing Commercial Airplanes Company, Seattle, WA

**9/89 – 7/92**  Graduate Research Assistant, Department of Electrical Engineering and Computer Science, University of Michigan, MI

**8/92 – 4/98** Assistant Professor, Department of Aeronautics and Astronautics, Naval Postgraduate School

**6/95 – 8/95** ASEE Fellow at NASA Langley Research Center, Langley, VA.

**5/98 – 9-03** Associate Professor, Department of Aeronautics and Astronautics, Naval Postgraduate School

**9/03 – to present** Professor, Department of Mechanical and Aerospace Engineering, Naval Postgraduate School, Monterey, CA.

**Fields of Expertise:**

Flight dynamics, Nonlinear control, Optimal control and System Identification.

**Honors and Awards:**

* NATO Fellowship for Scientific and Technological Exchange, 1994.
* ASEE/NASA Summer Faculty Fellowship, 1995.
* NPS Menneken Annual Faculty Award for Excellence in Scientific Research, 1997, 1999.

**Publications:**

1. Keller J., Thakur D., Dobrokhodov V., Jones K., Pivtoraiko M., Gallier J., Kaminer I., and Kumar V., “A Computationally Efficient Approach to Trajectory Management for Coordinated Aerial Surveillance,” Unmanned Systems, July 2013, Vol. 01, No. 01 : pp. 59-74, doi: 10.1142/S2301385013500040.
2. Xargay E., Kaminer I.I, Pascoal A.M., Hovakimyan N., Dobrokhodov V.N., Cichella V., Aguiar P., and Ghabcheloo R., “Time-Critical Cooperative Path Following of Multiple UAVs over Time-Varying Networks,” Journal of Guidance, Control, and Dynamics, Vol. 36, No. 2 (2013), pp. 499-516, doi: 10.2514/1.56538.
3. E. Xargay, V. Dobrokhodov, I. Kaminer, A. Pascoal, N. Hovakimyan, and C. Cao, “Time–Coordinated Path Following of Multiple Heterogeneous Vehicles over Time–Varying Networks,” invited paper in Special Issue on UAVs and Controls for IEEE Control Systems Magazine 2012.
4. Dobrokhodov V.N., Xargay E., Hovakimyan N., Kaminer I.I., Kitsios I., Cao C., Gregory I., Valavani L., “Experimental Validation of L1 Adaptive Control: Rohrs' Counterexample in Flight”, Journal of Guidance, Control, and Dynamics, 2011, Vol.34: 1311-1328, 10.2514/1.50683.

**Vladimir N. Dobrokhodov**

Research Assistant Professor

Department of Mechanical and Aerospace Engineering

Naval Postgraduate School

Monterey, CA 93943

**Education:**

M.S. Aerospace Engineering Sciences, Moscow State Aviation Institute, 1991

M.S. Operations Research, Air Force Engineering Academy, Moscow, 1993

Ph.D. Aerospace Engineering Sciences, Air Force Engineering Academy, Moscow, 1999

**Professional Experience:**

**2/01 – 8/04** National Research Council Post-Doctoral Fellow, Department of Aeronautics and Astronautics, Naval Postgraduate School, Monterey, CA.

**8/04 – 12/04** Post-Doctoral Fellow, University of California at Santa Barbara, Electrical and Computer Science Engineering department, Santa Barbara, CA.

**12/04 –12/09** Research Assistant Professor, Department of Mechanical and Aerospace Engineering, Naval Postgraduate School, Monterey, CA.

**12/09- to present:** Research Associate Professor, Department of Mechanical and Aerospace Engineering, Naval Postgraduate School, Monterey, CA.

**Fields of Expertise:**

Flight dynamics, Nonlinear control, Optimal control and System Identification.

**Honors and Awards:**

* National Research Council Post-Doctoral Fellowship: 2001,2002,2003,2004.
* Mikoyan Design Bureau Certificate of Recognition for the best software solution for the Airborne Pilot’s Associate, 1999
* Air Force Engineering Academy Award for Excellence in Scientific Research, 1995

**Relevant Publications:**

1. Keller J., Thakur D., Dobrokhodov V., Jones K., Pivtoraiko M., Gallier J., Kaminer I., and Kumar V., “A Computationally Efficient Approach to Trajectory Management for Coordinated Aerial Surveillance,” Unmanned Systems, July 2013, Vol. 01, No. 01 : pp. 59-74, doi: 10.1142/S2301385013500040.
2. Xargay E., Kaminer I.I, Pascoal A.M., Hovakimyan N., Dobrokhodov V.N., Cichella V., Aguiar P., and Ghabcheloo R., “Time-Critical Cooperative Path Following of Multiple UAVs over Time-Varying Networks,” Journal of Guidance, Control, and Dynamics, Vol. 36, No. 2 (2013), pp. 499-516, doi: 10.2514/1.56538.
3. E. Xargay, V. Dobrokhodov, I. Kaminer, A. Pascoal, N. Hovakimyan, and C. Cao, “Time–Coordinated Path Following of Multiple Heterogeneous Vehicles over Time–Varying Networks,” invited paper in Special Issue on UAVs and Controls for IEEE Control Systems Magazine 2012.
4. Dobrokhodov V.N., Xargay E., Hovakimyan N., Kaminer I.I., Kitsios I., Cao C., Gregory I., Valavani L., “Experimental Validation of L1 Adaptive Control: Rohrs' Counterexample in Flight”, Journal of Guidance, Control, and Dynamics, 2011, Vol.34: 1311-1328, 10.2514/1.50683.

**Kevin D. Jones**

Research Associate Professor

Department of Mechanical Engineering

Naval Postgraduate School

Monterey, CA 93943

**Education:**

B.S. Aerospace Engineering Sciences, University of Colorado, May 1988

M.S. Aerospace Engineering Sciences, University of Colorado, May 1990

Ph.D. Aerospace Engineering Sciences, University of Colorado, May 1993

**Professional Experience:**

**2/94 – 2/97** National Research Council Post-Doctoral Fellow, Department of Aeronautics

and Astronautics, Naval Postgraduate School, Monterey, CA.

**2/97 – 7/01** Research Assistant Professor, Department of Aeronautics and Astronautics,

Naval Postgraduate School, Monterey, CA.

**7/01 to present:** Research Associate Professor, Naval Postgraduate School.

**Fields of Expertise:**

Experimental and Computational Aerodynamics.

Design, manufacture and testing of micro air vehicles.

**Honors and Awards:**

* Bronze Award from the Royal Aeronautical Society for the paper “Bio-Inspired Design of Flapping-Wing Micro Air Vehicles,” 2006.
* Outstanding Research Achievement, Department of Aeronautics and Astronautics, Naval Postgraduate School, 1999.
* National Research Council Post-Doctoral Fellowship: 1994, 1995, 1996.
* Young Participant Bursary, 12th International Conference on Numerical Methods in Fluid Dynamics, Oxford University, England.

**Relevant Publications:**

1. Keller J., Thakur D., Dobrokhodov V., Jones K., Pivtoraiko M., Gallier J., Kaminer I., and Kumar V., “A Computationally Efficient Approach to Trajectory Management for Coordinated Aerial Surveillance,” Unmanned Systems, July 2013, Vol. 01, No. 01 : pp. 59-74, doi: 10.1142/S2301385013500040.
2. K.D. Jones, V. Dobrokhodov, I. Kaminer, T. Chung, M.R. Clement, M. Kolsch, and R. Zaborowski,” Cooperative Autonomy For The Masses – Fundamental Steps Toward Enabling Complex Multi-Asset Missions With Simple Point-And-Click Tasking,” AUVSI's Unmanned Systems North America Conference and Exhibit, Washington DC, August 16-19th, 2011.
3. V. Dobrokhodov, I. Kaminer, K.Jones, E. Xargay, N. Hovakimyan, P. Aquiar, and A. Pascoal,“ On Coordinated Road Search using Time-Coordinated Path Following of Multiple UAVs,” invited paper of AIAA Guidance, Navigation, and Control Conference, Toronto, Ontario, Canada, August 2-5, AIAA-2010-6188.