

**Directors and Executive Officers of the Corvis Corporation**

Name	Title
David R. Huber, Ph.D.	Chairman of the Board, President and Chief Executive Officer
James A. Bannantine	President
Mark Spagnola	President of Broadwing Communications, LLC
Lynn D. Anderson	Senior Vice President, Chief Financial Officer and Treasurer
Kim D. Larsen	Senior Vice President, Business Development, General Counsel and Secretary
Joseph R. Hardiman	Director
Freeman A. Hrabowski, III, Ph.D.	Director
David S. Oros	Director
Donald R. Walker	Director

## Corvis Corporation Management Resumes

**David R. Huber, Ph.D.** is the founder of Corvis. He has served as a Director and Chairman of Corvis' Board, President and Chief Executive Officer since June 1997. Dr. Huber has 20 years of experience in the development of optical communications systems. From 1992 through April 1997, Dr. Huber served first as Chief Technology Officer and later as Chief Scientist of Ciena Corporation, a company he founded in 1992. From 1989 through 1992, Dr. Hiber managed the Lightwave Research and Development Program for General Instrument Corporation. Prior to 1989, Dr. Huber held positions in optical communications development at Rockwell International Corporation, Optelecom, Inc. and ITT Industries, Inc., formerly International Telephone & Telegraph Corporation. Dr. Huber holds 41 U.S. patents in optics technology and has numerous additional patents pending. He earned a Ph.D. in electrical engineering from Brigham Young University and a B.S. in physics from Eastern Oregon State University. Dr. Huber is the brother-in-law of Mr. Larsen.

**James A. Bannantine** has been president of Corvis since May 2002. From September 2001 to May 2002, Mr. Bannantine was CEO of Dorsál Networks, Inc., a developer and manufacturer of undersea optical networking solutions for telecommunication service providers. Corvis Corporation purchased Dorsál Networks, Inc. in May 2002. From February 2001 to September 2001, Mr. Bannantine was President of Acumen Capital, LLC, a private equity firm focused on international infrastructure. From September 1990 to February 2001, Mr. Bannantine was CEO of Enron South America, a division of Enron Corporation with \$3.5 billion in assets and \$1.5 billion in revenues. From June 1978 to August 1990, Mr. Bannantine was an officer in the United States Army Corps of Engineers. Mr. Bannantine is a graduate of West Point and holds an M.B.A. from The Wharton Graduate School of Business.

**Mark F. Spagnolo** is president of Broadwing Communications, LLC. Over the last 30 years, he has held senior and executive management positions for start-ups and Fortune 500 companies, including various executive positions with Electronic Data Systems, as well as the position of president and CEO for UUNET, an industry leading data communications company. At UUNET, Mr. Spagnolo grew revenues substantially, while increasing margins and expanding operations into 29 countries. Prior to founding his own telecommunications consulting firm in 2002 (The Spagnolo Group, LP), Mr. Spagnolo was the president, CEO and chairman for SiteSmith, a managed services company that delivered outsourced Internet services to the Global 1000. In 2001, Metromedia Fiber Networks (MFN) purchased SiteSmith for \$1.4 billion, and later named Spagnolo president and CEO of MFN. During his tenure with SiteSmith/MFN, he combined MFN's three separate entities into a unified company resulting in substantial cost reductions, enhanced customer performance, and increased revenue. Most recently, he served as interim CEO for Flag Telecom. Mr. Spagnolo received a B.S. from Newark College of Engineering.

**Lynn D. Anderson** has been Corvis' Senior Vice President, Chief Financial Officer and Treasurer since January 2002. From May 2001 to December 2001, Mr. Andersen served as Chief Financial Officer of Optical Capital Group, LLC, a specialized technology investment firm focused on optical equipment related communications technology. From December 2000 to April 2001, Mr. Anderson was self-employed providing financial and strategic consulting services to companies in the technology, media and energy sectors. From February 2000 to November 2000, Mr. Anderson served as Chief Operating Officer and Chief Financial Officer of Zillacast, an Internet broadcasting company. From 1981 to 2000, Mr. Anderson held several financial positions with various divisions of General Electric Company and GE Capital. Mr. Anderson earned his B.A. from Kansas State University and his M.B.A. from the University of Texas.

**Kim D. Larsen** has served as Corvis' General Counsel and Secretary since September 1998, a Senior Vice President since June 2000 and was given responsibility for Business Development in February 2002. From October 1994 through September 1998, Mr. Larsen was a partner with the law firm of Mayer, Brown & Platt (now Mayer, Brown, Rowe & Maw) and served as partner-in-charge of its Cologne, Germany office, where he specialized in corporate mergers and acquisitions in the international telecommunications sector. Mr. Larsen earned his law degree from Columbia University and a B.S. in economics and political science from Brigham Young University. Mr. Larsen was a founding director of Ciena Corporation.

**Joseph R. Hardiman** has served as a Director since July 2000. Mr. Hardiman served as the President and Chief Executive Officer of the National Association of Securities Dealers, Inc. and its wholly owned subsidiary, The Nasdaq Stock Market, Inc., from September 1987 through January 1997. From 1975 through September 1987, Mr. Hardiman held various positions at Alex. Brown & Sons, including managing director and chief operating officer. Mr. Hardiman earned B.A. and LLB degrees from the University of Maryland. Mr. Hardiman serves on the boards of the Deutsche Scudder Funds, the ISI Funds, the Nevis Fund, Brown Investment Advisory Trust Company, Soundview Technology Group, Inc., University of Maryland Foundation, the University of Maryland School of Law and The Nasdaq Stock Market Education Foundation. Previously, he served on the boards of the Depository Trust Company, the Securities Industry Foundation for Economic Education, the Securities Regulation Institution and the Center for the Study of the Presidency and as a member of the American Business Conference.

**Freeman A. Hrabowski, III, Ph.D.** has served as a Director since October 2002. Dr. Hrabowski has been President of the University of Maryland, Baltimore County since May 1992. Dr. Hrabowski joined the University of Maryland in 1987, first serving as Vice Provost, then as Executive Vice President. Dr. Hrabowski serves as a consultant to the National Science Foundation, the National Institutes of Health, the National Academy of Sciences, the U.S. Department of Education, and various universities and school systems nationally. He is a member of numerous boards, including the Baltimore Community Foundation, the Baltimore Equitable Society, Constellation Energy Group, McCormick & Company, Inc., the Mercantile Safe Deposit & Trust Company, the Merrick & France Foundations, the Maryland Technology Council, and the University of Maryland Medical System. Dr. Hrabowski received a B.A. in mathematics from Hampton Institute and an M.A. in mathematics and a Ph.D. in higher education administration from the University of Illinois at Urbana-Champaign.

**David S. Oros** has served as a Director since January 2001. Mr. Oros has been Chairman and Chief Executive Officer of Aether Systems, Inc., a provider of wireless data services, systems and software since he founded Aether in 1996. From 1994 until 1996, Mr. Oros was President of Ne xGen Technologies, L.L.C., a wireless software development company that contributed all of its assets to Aether. From 1992 until 1994, he was President of the Wireless Data Group at Westinghouse Electric. From 1982 until 1992, Mr. Oros directed internal research and managed large programs in advanced airborne radar design and development at Westinghouse Electric. He currently serves on the boards of directors of Aether Systems, Inc. and Novatel Wireless, Inc. Mr. Oros received a B.S. in mathematics and physics from the University of Maryland.

**Donald R. Walker** has served as a Director since October 2002. Mr. Walker has served as an independent government consultant on intelligence space systems and missile defense and as a Senior Review Panel member for United States government agencies since November 2001. From April 2000 to November 2001, Mr. Walker served as president and chief executive officer of Veritect, a computer security firm. From 1995 through 2000, Mr. Walker served as chief information officer of United Services Automobile Association (USAA), a Fortune 200 financial services company and CEO and President of USAA's information technology company. Mr. Walker served in the United States Air Force from 1966 to 1995 and retired with the rank of Brigadier General. Mr. Walker received a B.S. in Engineering Science from the United States Air Force Academy, an M.S. in Mechanical Engineering from the University of Southern California and an M.B.A. from Auburn University.