

MARK D. WONG

PROFILE

Information Technology specialist with a deep and broad skillset in management, systems development, and a wide range of technologies. Decades of experience creating systems to improve productivity, empower the workforce, increase efficiency and capability, and take better advantage of technology.

EXPERIENCE

Chief Information Officer and Director of Department of Information Technology,
City and County of Honolulu, 2013-

Chief Executive Officer, Commercial Data Systems Honolulu, HI, 1986-2012

Vice-President, MicroTech, Inc. Honolulu, HI, 1981-1986

System Programmer, Data Tech, Inc. Honolulu, HI, 1980-1981

Senior Programmer/Analyst, University Operations, Yale University, New Haven, CT, 1975-1980

EDUCATION

Computer Science, B.S, Yale University, New Haven, CT

Iolani School, Honolulu, HI

PAST BOARD AND COMMUNITY EXPERIENCE

American Guild of Organists, Hawaii Chapter (former Dean)

American Heart Association (2005 Heart Ball Chair)

American Judicature Society, committee to research e-discovery and advise the Hawaii Supreme Court

Business Leadership Hawaii (head judge)

Hawaii Pacific Health (director)

Hawaii Public Radio (former director)

Hawaii Theatre Center (former director, vice-Chair)

Honolulu Academy of Arts (technology advisory committee, including hiring IT director)

Honolulu Symphony Foundation (chair)

Honolulu Symphony Society (2007 Symphony Ball chair)

Kakaako Makai Community Planning Advisory Council (founding chair)

Lotte Lehmann Foundation (past director)

Muscular Dystrophy Association (former chair)

St. Andrew's Cathedral, Archbishop Desmond Tutu 2012 planning committee

St. Christopher's Episcopal Church (past Vestry member)

Hawaii Pacific Health Compensation Committee (member)

Honolulu Symphony Society (ex-officio director)

CURRENT BOARD AND COMMUNITY EXPERIENCE

Aloha International Piano Festival (director, competition judge)

Honolulu Symphony Foundation (director)

Kaimuki Neighborhood Board, Mayor's representative

AWARDS AND HONORS

Entrepreneur of the Year (semi-finalist 1999, awardee 2000)

Business Leadership Hawaii (PBN)

Hawaii Top 250 (1999-2012)

Fastest 50 (PBN 1999)

#1 Hawaii Computer Consultant, Pacific Business News

Top Federal 8(a) IT Contractors (Washington Technology)

Best Place to Work (Hawaii Business)

AFCEA Senior Government Leader of the Month

TECHNICAL EXPERIENCE

Operating Systems: Solaris, Linux (Red Hat, Ubuntu), HP/UX, Windows, Mac OS/X, VMS, System V Unix, SCO Unix and Xenix, OS/VS, MVS, z/OS, OpenStack

Programming Languages: C, Java, PL/I, Assembler (8080/8085/Z80, 6502, 8088, 8086, 360/370), COBOL, Fortran, C++, Fortran, Algol, LISP, APL, Snobol, Pascal, Python, NodeJS

Scripting Languages: Javascript, PHP, conversion from Python, Ruby

Compiler writing, lexical analysis with lex/ flex, grammar parsers yacc and bison

Web Development: HTML, XML, XSLT, AJAX, jQuery, CSS

HTTP Servers and protocols: Apache, nginx, CGI, FastCGI Process Manager (FPM)

GIS: Google App APIs: Map, Geocoding, Documents, Sites, Mail, Groups; ESRI Javascript APIs

Music Notation and Production: Finale, Sibelius, MIDI, MusicXML, VST, Hauptwerk

Databases: PostgreSQL/ECPG, SQL Server, Informix/ESQL, MySQL, DB/2, Oracle, ODBC, MongoDB

Serial I/O: synchronous, asynchronous RS-232, RS-422

Network Programming: TCP/IP Sockets, UDP datagrams, RTP/RTSP streaming protocols, STREAMS, TLI, low-level serial interfaces, NFS, CIFS/SMB, AppleTalk, termio/termios, pseudo-terminals, raw socket I/O,

MVS and CICS sockets

System Programming: shared memory, semaphores, message queues, UNIX and POSIX locking, UNIX and POSIX threads, Doors, memory mapping

Graphics and Layout Applications: Photoshop, Illustrator, InDesign, FrameMaker, VectorWorks

Graphics Development: libjpeg, libtiff, raster conversions, matrix transformations for rescaling, rotation, sixel and PCL graphics encoding

Generation and recognition of optical mark, 3of9 barcodes, PDF417 3-D barcodes

Video transcoding, multicast, frame extraction, RTP and RTSP protocols

Telephony: NEC PBXs (including NEAX), Asterisk, PRI configuration, SIP trunking, RTP, H.323, Tandberg/Cisco VTC, Cisco IP Phones

Wide-Area Networking: various router administration, including Cisco, BGP, DNS/bind, CSU/DSU configuration. T-1, Frame Relay, PPP, uucp, SNA

Storage: SCSI, ESDI, FDDI, FCAL, FC, NFS, SMB, iSCSI, AppleTalk

Authentication and Directories: LDAP, Kerberos, Active Directory, YP/NIS/NIS+, RADIUS, DNS, Bind, Apache Directory Studio

Encryption: OpenSSL APIs, TLS, DES, MD5, RSA