# Istvan Jonyer, Ph.D.

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## PROFESSIONAL SUMMARY

Dr. Jonyer has over 22 years of industry and academic experience and is available to consult as an expert witness. Dr. Jonyer had an NSF and Department of Transportation funded machine learning research program at Oklahoma State University, after which at Google he was responsible for launching Google TV devices with global OEMs like Sony, Samsung, LG, and Intel. He designed 3G Wireless Telecommunications systems for Nortel Networks and has also launched three machine learning startups. He has been a venture capital investor investing in deep tech startups and conducting technology due diligence on the latest technology breakthroughs.

Dr. Jonyer has opined on numerous litigation matters involving patent infringement, invalidity, breach of contract, trade secret misappropriation, and contributory copyright infringement. He has filed reports and testified in deposition. He has opined on cases involving Google, Facebook, Apple, Uber, Intel, Cloudflare, Nokia, eBay, Salesforce, Slack, Dell, Roku, and others. Dr. Jonyer is praised for his clear and articulate communication skills, bringing complex concepts within reach of non-experts.

## EDUCATION

Ph.D. in Computer Science and Engineering, dissertation in Machine Learning (4.0 GPA)  Aug 2003
  The University of Texas at Arlington
  *Dissertation*: Context Free Graph Grammar Induction Using the Minimum Description Length Principle
  *Advisor*: Dr. Lawrence B. Holder

M.Sc. in Computer Science and Engineering (4.0 GPA)  May 2000
  The University of Texas at Arlington

B.Sc. in Computer Science and Engineering with High Honors  May 1999
  The University of Texas at Arlington

MBA, focus on Venture Capital and Entrepreneurship  May 2010
  Carnegie Mellon University, Tepper School of Business

## AREAS OF EXPERTISE

- *Networking and Telecommunications*: Wireless communication, Mobile, Wi-Fi, Bluetooth, 3G, 4G, 5G, Ad-hoc Networks, TCP/IP, Routing, Content delivery, CDN, Edge caching.

- *Machine Learning, Artificial Intelligence*: Neural networks, deep learning, network analysis, clustering, supervised learning, reinforcement learning, GANs, generative AI, hardware accelerators.

- *Smart TV and Smartphones*: Google TV, Chromecast, Roku, Android, Android TV, YouTube TV, Apple TV.

- *Software Analysis*: Computer Architecture, Cloud computing, Web applications, Internet computing.

## AWARDS AND ACHIEVEMENTS

- Google: Google TV Hall of Fame
- Google: Outstanding Leadership
- Google: Operating Committee award
- Google: Peer Award

- Best Paper Award, second place. Florida International Conference for Artificial Intelligence, 2003.
- Best dissertation award: PhD, Computer Science and Engineering, The University of Texas at Arlington
- Deloitte Case Competition: 1st Place – Carnegie Mellon University

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## EXPERT WITNESS EXPERIENCE

### Testifying Experience

- **Deposition** – March 2022. Expert for **Sleep Number Corporation**
  - *Case name*: Sleep Number Corporation v. Steven Jay Young; Carl Hewitt; UDP Labs, Inc.
  - United States District Court, District of Minnesota. Case No. 20-cv-1507 (NEB/ECW)
  - *Law firm*: Fox Rothschild

- **Deposition** – April 2021. Expert for **Mon Cheri Bridals** and **Maggie Sottero Designs**
  - *Case name*: Mon Cheri Bridals and Maggie Sottero Designs v. Cloudflare, Inc.
  - United States District Court, Northern District of California. Civil Action No. 19-cv-01356-VC
  - *Law firm*: Goldstein, Stark & Stark

### Cases

- Expert for **Snap-On, Inc.**                                     DEC 2022 – PRESENT
  - *Case name*: Snap-On, Inc. v. Cognizant Technology Solutions Corp. et al.
  - State of Wisconsin, Circuit Court, Kenosha County
  - Case No. 2021CV0000863
  - *Law firm*: O'Neil Cannon
  - *Nature of action*: Breach Of Contract

- Expert for **Dave, Inc.**                                        SEP 2022 – NOV 2022
  - *Case name*: Martinsek v. Dave, Inc.
  - Los Angeles County Superior Court
  - Case No. 19STCV42195
  - *Law firm*: Kilpatrick Townsend & Stockton
  - *Nature of action*: Breach Of Contract

- Expert for **Lemko Corp.**                                       JUN 2022 – PRESENT
  - *Case name*: Lemko Corp. v. Microsoft Corp.
  - United States District Court, Northern District of Texas
  - Case No. 3:22-cv-363
  - *Law firm*: Kramer Levin Naftalis & Frankel
  - *Nature of action*: Patent infringement

- Expert for **The State of Texas**                                MAY 2022 – PRESENT
  - *Case name*: The State of Texas v. Meta Platforms, Inc. (f.k.a. Facebook, Inc.)
  - District Court, 71st Judicial District, Harrison County, Texas
  - Cause No. 22-0121
  - *Law firm*: Attorney General of Texas; Keller Postman
  - *Nature of action*: Consumer Privacy

- Expert for **Collision Communications, Inc.**                    MAY 2022 – PRESENT
  - *Case name*: Collision Communications, Inc. v. Nokia Solutions and Networks Oy
  - United States District Court, District of New Hampshire
  - Case No. 1:20-cv-00949
  - *Law firm*: Ropes and Gray

- o *Nature of action*: Breach of contract

- Expert for **BillJCo LLC**                                          MAR 2022 – PRESENT
  - o *Case name*: Apple Inc, v. BillJCo LLC
  - o USPTO, Patent Trial and Appeal Board (PTAB)
  - o Cases:
    - ▪ IPR2022-00129
    - ▪ IPR2022-00131
    - ▪ IPR2022-00310
  - o *Law firm*: Saul Ewing Arnstein & Lehr
  - o *Nature of action*: IPR, Bluetooth beacons

- Expert for **Sleep Number Corporation**                            JUN 2021 – DEC 2022
  - o *Case name*: Sleep Number Corporation v. Steven Jay Young; Carl Hewitt; UDP Labs, Inc.
  - o United States District Court, District of Minnesota
  - o Case No. 20-cv-1507 (NEB/ECW)
  - o *Law firm*: Fox Rothschild
  - o *Nature of action*: Breach of contract
  - o **Deposed**

- Expert for **ReactX**                                              FEB 2020 – PRESENT
  - o *Case name*: ReactX LLC v. Google LLC
  - o Superior Court of California
  - o Case No. 18STCV09674
  - o *Law firm*: Boies Schiller Flexner; Cohen Milstein Sellers & Toll; Bird Marella
  - o *Nature of action*: Breach of Contract, Digital Advertising Technology

- Expert for **Express Mobile**                                      NOV 2021 – PRESENT
  - o *Cases*:
    - ▪ Express Mobile, Inc. v. Facebook, Inc. - Civil Action No. 6:20-cv-00803-ADA
    - ▪ Express Mobile, Inc. v. eBay Inc. - Civil Action No. 6:20-cv-802-ADA
    - ▪ Express Mobile, Inc. v. Salesforce.com, Inc. - Civil Action No. 3:20-cv-08461-WHO
    - ▪ Express Mobile, Inc. v. Slack Technologies, Inc. - Civil Action No. 3:21-cv-02001-RS
  - o United States District Court, Northern District of California, San Francisco Division
  - o *Law firm*: Feinberg Day
  - o *Nature of action*: Patent infringement, Web Technologies

- Expert for **WSOU INVESTMENTS, LLC**                               AUG 2020 – PRESENT
  - o *Case name*: WSOU INVESTMENTS, LLC v. Google LLC
  - o United States District Court, Western District of Texas, Waco Division
  - o Civil Action 6:20-CV-00571-ADA
  - o Civil Action 6:20-CV-00572-ADA
  - o Civil Action 6:20-CV-00573-ADA
  - o Civil Action 6:20-CV-00574-ADA
  - o Civil Action 6:20-CV-00575-ADA
  - o Civil Action 6:20-CV-00576-ADA
  - o Civil Action 6:20-CV-00577-ADA
  - o Civil Action 6:20-CV-00578-ADA
  - o Civil Action 6:20-CV-00579-ADA
  - o Civil Action 6:20-CV-00580-ADA
  - o Civil Action 6:20-CV-00581-ADA
  - o Civil Action 6:20-CV-00582-ADA
  - o Civil Action 6:20-CV-00583-ADA
  - o Civil Action 6:20-CV-00584-ADA

- o Civil Action 6:20-CV-00585-ADA  (active)
- o *Law firm*: Etheridge Law Group; Carter Arnette; Folio Law
- o *Nature of action*: Patent infringement

- Expert for **WSOU INVESTMENTS, LLC**                          AUG 2021 – FEB 2022
  - o *Case name*: WSOU INVESTMENTS, LLC v. Dell, Inc.
  - o United States District Court, Western District of Texas, Waco Division
  - o Civil Action 6:20-CV-00474
  - o Civil Action 6:20-CV-00475
  - o Civil Action 6:20-CV-00476
  - o Civil Action 6:20-CV-00477
  - o *Law firm*: Etheridge Law Group
  - o *Nature of action*: Patent infringement

- Expert for **PicClick, Inc.**                                          MAR 2022
  - o *Case name*: Lickerish, Inc. et al., v. PicClick, Inc.
  - o United States District Court, Southern District of California
  - o Case No. 21-cv-01303-TWR-JLB
  - o *Law firm*: Procopio
  - o *Nature of action*: Contributory copyright infringement (DMCA)

- Expert for **Media Chain, LLC**                                AUG 2021 – DEC 2021
  - o *Case name*: Media Chain, LLC, v. Roku, Inc.
  - o United States District Court, Western District of Texas, Austin Division
  - o Case No. 1:21-cv-00027
  - o *Law firm*: Winston & Strawn
  - o *Nature of action*: Patent infringement (digital content rights management)

- Expert for **Ikorongo**                                          JUN 2021 – NOV 2021
  - o *Case name*: Ikorongo Texas LLC and Ikorongo Technology LLC., v. Uber Technologies, Inc.
  - o United States District Court, Western District of Texas, Waco Division
  - o Case No. 6:20-cv-00843-ADA
  - o *Law firm*: Wisnia Law
  - o *Nature of action*: Patent infringement (location technologies)

- Expert for **Vargas et al.**                                      JAN 2020 – NOV 2021
  - o *Case name*: Vargas, et al., v. Facebook, Inc.
  - o United States District Court, Northern District of California, San Francisco Division
  - o Case No. 3:19-cv-5081 (class action)
  - o *Law firm*: Mantese Honigman
  - o *Nature of action*: Fair Housing Act (Advertising technology)

- Expert for **Health Discovery Corporation**                    JUL 2021 – SEP 2021
  - o *Case name*: Health Discovery Corporation v. Intel Corporation
  - o United States District Court, Western District of Texas, Waco Division
  - o Case No. 6:20-cv-00666-ADA
  - o *Law firm*: Dunlap Bennett & Ludwig
  - o *Nature of action*: Patent infringement

- Expert for **Uzair, et al.**                                      AUG 2020 – APR 2021
  - o *Case name*: Uzair, et al. v. Google LLC
  - o Superior Court of The State of California, County of Santa Clara
  - o Case No.: 1-18-CV-328915 (class action)
  - o *Law firm*: Goldstein, Borgen, Dardarian & Ho

- o *Nature of action*: Terms of Use disclosures

- Expert for **Universal Electronics Inc.** JUL 2020 – OCT 2020
  - o *Case name*: Universal Electronics Inc. v. Roku, Inc.
  - o United States International Trade Commission (ITC)
  - o Investigation No. 337-TA-1200
  - o *Law firm*: Alston & Bird
  - o *Nature of action*: Patent infringement (Smart TV)

- Expert for **Mon Cheri Bridals** and **Maggie Sottero Designs** MAY 2020 – APR 2021
  - o *Case name*: Mon Cheri Bridals and Maggie Sottero Designs v. Cloudflare, Inc.
  - o United States District Court, Northern District of California
  - o Civil Action No. 19-cv-01356-VC
  - o *Law firm*: Goldstein, Stark & Stark
  - o *Nature of action*: Contributory copyright infringement (DMCA)
  - o **Deposed**

- Expert for **Unified Patents, LLC** MAR 2020 – AUG 2020
  - o *Case name*: Unified Patents, LLC v. Investel Capital Corporation
  - o USPTO, Patent Trial and Appeal Board (PTAB)
  - o Case: IPR2020-00781
  - o *Law firm*: Stoel Rives
  - o *Nature of action*: IPR (wireless networking)

- Expert for Hiscox USA (insurer of **Tri Star Sports and Entertainment Group, Inc**) SEP 2019 – DEC 2019
  - o *Case name*: Tri Star Sports and Entertainment Group, Inc. v. Weezlabs, Inc.
  - o Superior Court of The State of California, County of Los Angeles
  - o Case No. SC129703
  - o *Client*: Hiscox USA
  - o *Nature of action*: Breach of Contract

- Expert for **Universal Electronics Inc.** MAR 2019 – NOV 2019
  - o *Case name*: Universal Electronics Inc. v. Roku, Inc.
  - o US District Court, Central District of California
  - o Case No. 8:18-cv-01580
  - o *Law firm*: Alston & Bird
  - o *Nature of action*: Patent infringement (Smart TV)

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## PROFESSIONAL EXPERIENCE

**EXPERT WITNESS AND TECHNOLOGY STRATEGY CONSULTING, SIDESPIN GROUP LLC**

SAN FRANCISCO, CA; LOS ANGELES, CA SEP 2013 – MAR 2015; JAN 2019 – PRESENT

Litigation and technology strategy consulting. Focus on IP infringement, validity, IPR, and breach of contract cases.
- **Expert Witness**
  - o ***See above section*** *for details of all expert witness consulting cases.*
  - o **Pre-Litigation Consulting**
    - ▪ For **FedEx**, patent invalidity research. *Law firm*: Fish Richardson.
  - o **Patent portfolio evaluation**

- Distributed systems and virtualization technology assessment against a multi-national video streaming provider to evaluate a family of patents against their product portfolio, especially in the areas of caching, CDN, software testing, and cybersecurity.
- **Technology Strategy, Due Diligence, Investment Advisory**
  - **Berkshire Hathaway HomeServices –** Technology Due Diligence (ended 2/2020): Berkshire Hathaway HomeServices was interested in verifying their technology roadmap and evaluating potential technology acquisitions to complement their existing technology stack.
  - **Broadcom (Avago Technologies) –** Large-scale patent portfolio evaluation and assertability assessment (ended 7/2020): Led a team of four experts in evaluating a 2,000-patent portfolio of cybersecurity patents. Methodology includes in-house algorithmic metadata analysis and manual expert review of specific patents.
  - **WordPress (Automattic, Inc.) –** Acquisition Due diligence (ended 3/2021): Technical due diligence of acquisition target in the web and mobile content analytics space. Review of open-source exposure, machine learning, NLP, data science, and back-end data pipeline.
  - **PwC Australia –** Technical process evaluation (ended 7/2021): Engaged to evaluate the research and development process of a smart digital signage company in connection with a government review process.
  - **Omni Bridgeway –** Investment Due Diligence (ended 3/2021): Consultant to Omni Bridgeway litigation finance on Neural Magic v. Facebook – Machine Learning trade secret misappropriation by Facebook of Deep Learning neural network algorithms.
  - **Astrea Technology Acquisition –** SPAC merger due diligence (ended 7/2021): Engaged to evaluate the technology stacks of two SPAC merger candidates for ease of integration and full technology stack review.
  - **Expeditors, Inc. –** Acquisition Due Diligence (ended 4/2020): Technology due diligence and evaluation of acquisition target in the logistics technology space. Audit of full software stack, open-source exposure, team, and software engineering practices.
  - **Prep Expert, Inc. –** Investment Due Diligence (ended 4/2021): Machine learning, software architecture, and open-source library review in support of investment decision.
  - **Adaptelligence**: Developed commercialization plan for an academic research program in machine learning for healthcare.
  - **Rescale**: Opened up the animation and rendering space with partners like *Pixar, NVIDIA, Autodesk* and *Adobe*.
  - **NimbleVR**: Technology commercialization strategy to the struggling hand-gesture recognition startup. Recommended pivot to a camera-based immersive VR controller. The company was acquired by *Oculus (Facebook)* 4 months later.
  - **Near-Me**: Product strategy and engineering restructuring.
  - **MediaMark**: Provided strategic direction to the media analytics startup. Recommended pivoting from passive theater-goer measurement to reward-based engagement, resulting in a well-defined product, and commitments from major studios.
  - **Pro Bono Mentoring**
    - Advising startups at ex-Google network, Stanford Venture Studio, and other early-stage startups. Invited speaker at various startup accelerators, Stanford, and Carnegie Mellon University.
    - Advising Stanford's Office of Technology Licensing (OTL) and their student teams on identifying marketable patent portfolios and creating supporting marketing materials.

## ACADEMIC EXPERIENCE

**ASSISTANT PROFESSOR OF COMPUTER SCIENCE**, OKLAHOMA STATE UNIVERSITY        SEP 2003 – SEP 2008
Published thought leader with research focusing on various machine learning approaches, including graph mining, genetic programming, and neural networks.

- **Awards**: Best Paper Award, second place, Florida International Conference for Artificial Intelligence, 2003.

- **Research focus:** Machine learning (Graph-based Data Mining, Social Network Analysis, Genetic Programming).
- **Parallel computing:** Created a POSIX-thread implementation for Windows, which would make ANSI-standard multi-threaded C/C++ code source-code compatible with Windows.
- **Founded** the OSU Supercomputing Center, the largest such facility at *OSU*, supporting research in multiple departments.
- **Published** and presented at over 20 international conferences and workshops.
- **Funding** by the National Science Foundation.
- **Taught** 9 courses, both graduate and undergrad (e.g., Artificial Intelligence, Theoretical foundations, Advanced algorithms)

## OPERATING EXPERIENCE

**GOOGLE TV GLOBAL HEAD OF DEVICE PARTNERSHIPS, GOOGLE,** MOUNTAIN VIEW, CA          AUG 2010 – FEB 2012
Chromecast's predecessor, Google TV was an Android-based Smart TV platform launched in multiple form factors, including TV sets, Blue-Ray players, and companion boxes, with device OEMs including Sony, LG and Vizio.
- **Awards**: Google TV Hall of Fame, Outstanding Leadership (by VP), Operating Committee award (team), Peer Award.
- **Partnerships**: Developed high-level product strategy with launch partner leadership at the CEO, GM, VP and division head level. Drove and executed partnership strategy with Sony, LG, Intel, Marvell, MediaTek and others to shape the next generation TV experience and ecosystems.
- **Cross-functional leadership**: Led team of technical account managers, software engineers and technical writers in Mountain View and Seoul, South Korea through two successful product launches with OEM partners *Sony*, *Logitech*, *Vizio* and *LG*.
- **Scaling Vertical**: Architected a scalable, light-touch device launch process, from partner on-boarding through technical execution and final launch, enabling 10+ SOC and OEM partners to launch devices largely independently from Google, supported by only 3 technical account managers. (Resulted in Outstanding Leadership award.)
- **Product leadership:** Owned the Google TV requirements document and ensured that our partners complied with our product vision. Owned the remote-control definition and approval, which was the main interactive UX component.
- **Leadership**: Recognized and resolved major legal faux pas with GTV's state of 3rd party software licensing that left Google exposed to major liability. Led negotiations to resolve gaps in licensing, resulting in the *Google TV Hall of Fame* award, and being a sought-after expert within Google for structuring external software licensing agreements.
- **Team building**: Grew team from 2 to 10 reports across Mountain View and Seoul, S. Korea.

**FOUNDER AND COO**, **ADAPTELLIGENCE**, LOS ANGELES, CA          AUG 2021 – PRESENT
NIH-funded early-stage machine learning startup in the health technology space. Part time.
- In charge of commercialization of machine learning research.
- Product management.
- Oversee operations and budget.

**FOUNDER, FANTASY BRAIN, INC.**, SAN FRANCISCO, CA          FEB 2012 – SEP 2013
Big data analytics startup in the fantasy sports space.
- **Positioning**: Developed positioning as the 'Fantasy IQ vendor', to emphasize the value to potential acquirers as complementary to their existing audience, leading to acquisition interest from *Yahoo* and *CBS*, and partnership with the *NFL*.
- **Technical Leadership**: Led technical execution with a team of 2 local and 5 offshore engineers and designers to ship the product 6 weeks prior to hard launch deadline (start of football season), through a 4-month idea-to-launch engineering effort.

**FOUNDER AND CEO, KDRESEARCH, INC.**, TULSA, OK                                        2007 – 2008

Stock option search engine with the widest array of search options in the industry at a significantly lower price than the market leader.

- Identified opportunity, created and prioritized feature set and fully implemented the back-end architecture.
- Developed and closed partnership with the *Snider Financial Network* to provide options data to their customers.


## ENGINEERING EXPERIENCE

**SOFTWARE ENGINEER, NORTEL NETWORKS, INC.**, RICHARDSON, TX                  JUN 2000 – JUN 2003

A multinational telecommunications equipment manufacturer with $40bn in revenues in 2000.

- **Designed** key features of the *Sprint Vision* 1$^{st}$ generation 3G mobile Internet packet data switching node (PDSN).
- **Implemented** the Open Radio Protocol (Open-RP) for the *Shasta Networks* PDSN (C and VxWorks).
- **Identified** and implemented performance optimizations that resulted in a 20% increase in transmission speed.

**FOUNDER, FANTASY BRAIN, INC.**, SAN FRANCISCO, CA                          FEB 2012 – SEP 2013

Big data analytics startup in the fantasy sports space.

- **Algorithms**: Invented and implemented the Fantasy IQ big-data algorithms.
- **Technical Leadership**: Led technical execution with a team of 2 local and 5 offshore engineers and designers to ship the product 6 weeks prior to hard launch deadline (start of football season), through a 4-month idea-to-launch engineering effort.
- **Engineering**: Architected and wrote most the code base (Ruby on Rails, Postgres, Solr, Heroku, AWS, etc.).

**FOUNDER AND CEO, KDRESEARCH, INC.**, TULSA, OK                                        2007 – 2008

Stock option search engine with the widest array of search options in the industry at a significantly lower price than the market leader.

- **Developed** and closed partnership with the *Snider Financial Network* to provide options data to their customers.


## VENTURE CAPITAL EXPERIENCE

**MANAGING DIRECTOR**, **SIDESPIN VENTURES**, LOS ANGELES, CA                   MAR 2019 – PRESENT

Venture capital investor into early-stage technology companies.

- **Deal sourcing, due diligence, fundraising:** Angel investor and GP of venture capital syndicate.

**PRINCIPAL, NEXSTAR PARTNERS**, SAN FRANCISCO, CA                          MAR 2015 – NOV 2018

$100M early growth venture capital fund.

- **Area expert** in Machine Learning and other subfields of AI, such as Deep Learning, Neural Networks, Autonomous Technologies (including sensing technologies, like LIDAR, radar, etc.), as well as Smart TV, Media Delivery, Augmented Reality, Virtual Reality, Telecommunications and Wireless Infrastructure technologies.
- **Focus:** Patentable technology differentiation (fund's LP was major patent licensing entity, with frequent dialogue around patent portfolios and reviews)

**SENIOR ASSOCIATE, PITTSBURGH EQUITY PARTNERS,** PITTSBURGH, PA            SEP 2008 – AUG 2010

Early-stage venture capital firm.

- **Due Diligence**: Technical deep dives on over 30 companies. Developed the firm's investment scorecard, promoting a disciplined deal evaluation framework.

- **Sourcing**: Successfully generated deal flow by developing relationships with the *CMU Entertainment Technology Center* and *Center for Entrepreneurship, Adams Capital, Draper Triangle Ventures, BlueTree Angels* and others.

**SUMMER ASSOCIATE, NEW VENTURE PARTNERS, LLC,** MURRAY HILL, NJ                    SUMMER, 2009
Global, early-stage venture capital firm with $750M AUM, specializing in corporate spinouts.
- **Technical diligence:** Opportunities with NEC Research (machine learning), OKI Data (video conferencing), NXP Software (interactive ad-tech).
- **Patent Valuation:** Analyzed the impact of intellectual property on the success of early-stage investments based on self-collected data, to help focus subsequent due diligence efforts and appropriately value patents as part of deal flow.
- **Portfolio support:** Semiconductor manufacturer, EverSpin (spinout from Freescale Semiconductor), needed updated financial projections based on numbers deeply rooted in their manufacturing operations.
- **Market Research**: Mapped the competitive landscape and future direction of the Videoconferencing industry by comprehensive primary and secondary research, correctly identifying rising stars and technology trends.
- **Sourcing**: Generated deal flow from academia (CMU, OSU, UTA, NYU, WSU), research labs (Xerox PARC, NEC, IBM Watson, Sandia NL) and tech giants via my MBA, engineering, scientific and VC networks.
- **Positioning**: Created new business strategy for *PowerCloud Systems,* pivoting the company's cloud-based router configuration technology to the SMB space, resulting in a $3.2M round of financing, saving the company from bankruptcy. The company was eventually acquired by Comcast.

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## PUBLICATIONS

**Editor**
- Special issue on FLAIRS 2007: Machine learning, data mining and neural networks. June 2008, International Journal of Artificial Intelligence Tools, 17(3). Guest editors: Zdravko Markov, Lawrence Holder, Istvan Jonyer, David Bisant.

- Hybrid Neurocomputing: Selected Papers from the 2nd International Conference on Hybrid Intelligent Systems (HIS 2002). Neurocomputing, Volume 61, October, 2004. Edited by A. Abraham, I. Jonyer, E.I. Barakova, R. Jain, and L. Jain.

**Book Chapters**
- I. Jonyer, "Graph Grammar Learning" in Mining Graph Data. L.B. Holder & D.J. Cook (editors). Wiley and Sons, 2006.

- L.B. Holder, D.J. Cook, J. Gonzalez, and I. Jonyer, "Structural Pattern Recognition in Graphs," D. Chen and X. Cheng (Editors) Pattern Recognition and String Matching, Kluwer Academic Publishers, 2002.

**Journal Articles**
- I.J. Khor, J. Thomas, and I. Jonyer, "Sliding Window Protocol for Secure Group Communication in Ad-Hoc Networks". Journal of Universal Computer Science, Vol.11, No.1, pages 37-55. 2005.

- I. Jonyer, L.B. Holder, and D.J. Cook "MDL-Based Context-Free Graph Grammar Induction and Applications". International Journal of Artificial Intelligence Tools, Volume 13, No. 1 pages 65-79, 2004.

- D.J. Cook, L.B. Holder, S. Su, R. Maglothin, and I. Jonyer, "Structural Mining of Molecular Biology Data," IEEE Engineering in Medicine and Biology, Special Issue on Advances in Genomics, Volume 20, Number 4, pages 67-74, 2001.

- I. Jonyer, L.B. Holder, and D.J. Cook, "Graph-Based Hierarchical Conceptual Clustering," Journal of Machine Learning Research, Volume 2, pages 19-43, 2001.

- I. Jonyer, L.B. Holder, and D.J. Cook, "Graph-Based Hierarchical Conceptual Clustering," International Journal of Artificial Intelligence Tools, Volume 10, Number 1-2, pages 107-135, 2001.

## Conference Articles

- M. Solano and I. Jonyer, "Performance Analysis of Evolutionary Search with a Dynamic Restart Policy," Proceedings of the Twentieth International Florida Artificial Intelligence Research Society Conference, May 7-9, 2007, Key West, Florida, USA.

- M. Solano, I. Jonyer, "Towards an optimal restart strategy for genetic programming."
- Proceedings of the Genetic and Evolutionary Computation Conference, July 7-11, 2007. London, England, UK.

- I. Jonyer and A. Kikuchi, "Improving Modularity in Genetic Programming using Graph Based Data Mining," Proceedings of the Nineteenth Annual Florida Artificial Intelligence Research Society, May 2006.

- M. Cai, I. Jonyer, and M. Paprzycki, "Improving Parallelism in Structural Data Mining" Proceedings of the Sixth International Conference On Parallel Processing And Applied Mathematics, 2005.

- I. Jonyer, P. Apiratikul, and J. Thomas, "Source Code Fingerprinting Using Graph Grammar Induction," Proceedings of the Eighteenth Annual Florida Artificial Intelligence Research Society, May 2005.

- J. Khor, J. Thomas, and I. Jonyer, "Sliding Window Protocol for Group Communication in Ad-Hoc Networks," Proceedings of the Hawaii International Conference on System Sciences, January, 2005.

- I. Jonyer, L. B. Holder, and D. J. Cook, "Attribute-Value Selection Based on the Minimum Description Length," Proceedings of the International Conference on Artificial Intelligence, 2004.

- A. Gilbert, J. Thomas, and I. Jonyer, "Modeling Work Flow in Hierarchically Clustered Distributed Systems", Proceedings of the International Conference on Parallel and Distributed Processing Techniques and Applications, 2004, Volume 3.

- J. Thomas, T. Alam, and I. Jonyer, "Reducing Latency in Ad Hoc Networks by Pre-Fetching," Proceedings of the International Conference on Pervasive Computing and Communications, 2004.

- I. Jonyer, L.B. Holder, and D.J. Cook, "MDL-Based Context-Free Graph Grammar Induction," Proceedings of the Sixteenth Annual Florida Artificial Intelligence Research Society, 2003.
- Best Paper Award, Second Place.

- I. Jonyer, L.B. Holder, and D.J. Cook, "Concept Formation Using Graph Grammars," Proceedings of the Knowledge Discovery in Databases Workshop on Multi-Relational Data Mining, pages 71-79, 2002.

- J. Gonzalez, I. Jonyer, L.B. Holder, and D.J. Cook, "Efficient Mining of Graph-Based Data," Proceedings of the American Association for Artificial Intelligence Workshop on Learning Statistical Models from Relational Data, pages 21-28, 2000.

- I. Jonyer, L. B. Holder, and D. J. Cook, "Graph-Based Hierarchical Conceptual Clustering in Structural Databases," Proceedings of the 7th Conference on Artificial Intelligence and of the 12th Conference on Innovative Applications of Artificial Intelligence, page 1073, 2000.

- I. Jonyer, L. B. Holder, and D. J. Cook, "Graph-Based Hierarchical Conceptual Clustering," Proceedings of the Thirteenth Annual Florida Artificial Intelligence Research Society, pages 91-95, 2000.

- I. Jonyer, "Context-Free Graph Grammar Induction Using the Minimum Description Length Principle" Doctoral Dissertation. The University of Texas at Arlington. L.B. Holder, advisor. August, 2003.

- I. Jonyer, "Hierarchical Conceptual Clustering Using a Graph-Based Knowledge Discovery System" Master's Thesis. The University of Texas at Arlington. L.B. Holder, advisor. May, 2000.

- I. Jonyer, "Study of a Conversational Artificial Intelligence System" Undergraduate Honors Thesis. The University of Texas at Arlington. L.B. Holder, advisor. May, 1999.

**Editorials**
- FLAIRS 2007: Machine learning, data mining and neural networks – Preface. International Journal of Artificial Intelligence Tools, Volume 17(3), pages 411-414. June 2008. Z. Markov, L.B. Holder, I. Jonyer, and D. Bisant.

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