Invited Talks

Invited Talk by Bruce Blumberg

Bruce Blumberg (Blue Fang Games)

Blumberg leads Blue Fang's Synthetic Animal Team, which is focused on creating the technology, tools and processes that will enable Blue Fang to create expressive, intelligent and engrossing animal characters that will set the bar for the next generation of digital entertainment experiences.

Prior to joining Blue Fang, Blumberg was an associate professor at The Massachusetts Institute of Technology (MIT) Media Lab where he served as the director of the Synthetic Characters Group. This group performed groundbreaking research on behavior, learning and motor control for autonomous animated characters.

As director of the Synthetic Characters Group, Bruce has led teams that created and developed numerous award-winning interactive installations at such prestigious venues as SIGGRAPH, Ars Electronica, E3, and AAAI. An impressive list of published papers can be added to the list of awards he and his group have received, including grand prize for Alpha-Wolf at the 2002 Digital Art Awards.

Prior to joining the MIT Media Lab, Blumberg held management positions at Apple Computer and NeXT Computer.

Bruce Blumberg holds an MS in management from the MIT Sloan School of Management and a PhD in media arts and sciences from the MIT Media Laboratory.

AiLive's LiveMove and LiveCombat

Wolff Daniel Dobson and John Funge (AiLive Inc.)

In this talk we describe how we successfully productized our state-of-the-art statistical machine learning technology to create LiveMove and LiveCombat. LiveMove is a groundbreaking artificial intelligence product that enables the Wii Remote to learn. Instead of complicated programming, developers need only take a few minutes to train Wii controllers through examples. Nintendo now sublicenses and promotes LiveMove to Wii developers around the world. Our other product, LiveCombat, gives developers and players the power to build AI characters that learn how to behave by observing the actions of human players. Your AI characters learn in seconds to be trusted companions or deadly foes. The talk will include many anecdotes and observations that we learned, often the hard way, along the way.

Wolff Daniel Dobson received his PhD in computer science from Northwestern University, specializing in artificial intelligence and intelligent user interfaces. At Visual Concepts Entertainment, he constructed emotional behavior on NBA2K for Dreamcast, and then became colead for artificial intelligence on NBA2K1 (garnering a Metacritic.com score of 93). For the past 5 years he has worked for AiLive Inc., a startup devoted to next-generation artificial intelligence in games. Working as a designer, producer, engineer, and artist Wolff has been instrumental in developing two commercial products, LiveMove and LiveCombat, that bring groundbreaking real-time machine learning technology to the computer entertainment industry.

John Funge is a cofounder and one of the lead scientists at AiLive Inc. At AiLive he helped develop LiveMove and LiveCombat, two commercial products that bring groundbreaking real-time machine learning technology to the computer entertainment industry. Funge previously worked at Sony Computer Entertainment America's research lab. He received his PhD in computer science from the Univer-
University of Toronto and also holds degrees from Oxford University and King's College London. Funge is the author of numerous technical papers and two books on Game AI, including his latest book *Artificial Intelligence for Computer Games: An Introduction*.

**Streaming, Open-World Pathfinding**

*Quinn Dunki (Midway Games)*

Open-world, streaming environments are common in next generation games, but pose significant challenges for pathfinding. We’re now tasked with accurate pathfinding for hundreds of agents in a very large, highly dynamic environment, which is subject to the chaos of multi-threaded streaming and physics. This talk will detail our approach on a particular project here at Pandemic Studios.

Quinn Dunki is an AI programmer at Pandemic Studios. She was born and raised in Canada, but has been living and working in California for the past 8 years. She has been making games for a little over 20 years, the last 11 of which have been professional. In her spare time, she races cars, writes, and travels as much as she can. She also looks forward to belittling her coworkers with sarcasm each and every day.

**Invited Talk by Chris Hecker**

*Chris Hecker (Maxis/Electronic Arts)*

Hecker focuses on solving hard game design and technical problems found at the intersection of gameplay, aesthetics, and engineering. He is an outspoken advocate for pushing the current boundaries of design and interactivity, in the hope that games will achieve their full potential as an art and entertainment form. To this end he helps organize the yearly Indie Game Jam and the Experimental Gameplay Workshop, and his recent work at Maxis has centered around using advanced procedurism to enhance player creativity and agency. Hecker has been on the advisory board for the Game Developers conference for many years and is a regular speaker at the GDC, Siggraph, and other conferences. A frequent contributor to *Game Developer* magazine, Hecker was the technical columnist for the magazine for two years and the editor-at-large for three. Before joining Maxis he was an indie game developer for 8 years with his company definition six, inc. He is also on the editorial board of the computer graphics research publication, *The Journal of Graphics Tools*.

**Exotic AI Techniques for Sims 3**

*Richard Evans (Electronic Arts)*

I will show some of the more unusual AI techniques we are experimenting with in *Sims 3*. These include very long-term planning, autonomous traits, and a new socializing model based on overlapping normative processes. I will show how these technology components allow us to meet two high-level design goals: to make each Sim be a unique snowflake, and to move up Maslow’s hierarchy of needs. I will be showing these ideas working in action in our 2D experimental testbed.

Richard Evans is senior AI engineer on *The Sims 3* at Electronic Arts, where he is responsible for the AI architecture, and also likes to get involved in game design. Previously, he was head of AI at Lionhead Studios, where he designed and implemented the AI for *Black & White*. The artificial creature in *Black & White* holds the Guinness world record for most intelligent being in a game.

**A Work in Progress:**

**Writing AI for Civilization**

*Soren Johnson (EA Maxis)*

As one of the best-loved single-player strategy games, *Civilization* relies heavily on its AI to provide an engaging experience for the player. A review of the game’s development suggests answers to many of the questions that often plague AI developers. How do we make the AI fun? Do we want the AI to win? Should the AI
cheat? If so, how much? Should we adjust the
game design to accommodate the limitations of
the AI? Can the AI behave like a human?
Should it? When and how should the AI be
developed? What happens if we expose the AI
to the modding community?

Soren Johnson served as the project lead,
lead designer, and AI programmer for Sid
Meier’s Civilization IV, which was Gamespy’s
game of the year for 2006. He also pro-
grammed the AI and codesigned Civilization
III. He joined Firaxis in 2000, after serving an
internship at Electronic Arts working on
Knockout Kings for the PSX. Soren has com-
pleted a BA in history and an MS in computer
science from Stanford University. His thoughts
on game design can be found at designer-
notes.com.

Invited Talk by Peter Molyneux

Peter Molyneux (Lionhead Studios)

Peter Molyneux is one of the best-known
names in the international world of computer
games. He cofounded Bullfrog Productions in
1987 and created a new genre of computer
games, “the god game” with the release of Pop-
ulous. Since then Peter has been responsible for
a string of massive selling games including Pow-
ermonger, Theme Park, Magic Carpet and Dun-
geon Keeper. Cumulative sales of these Bullfrog
games are around ten million worldwide. In
1997 Peter left Bullfrog Productions to form a
new games development company Lionhead
Studios. The company has released five games
Black & White in 2001, Fable in 2004 Black &
White 2 (PC), The Movies (PC) and Fable The
Lost Chapters (PC and Xbox) in 2005. Cumula-
tive sales are approaching the 5 million mark.
Lionhead now numbers over 135 employees. In
April 2006 Lionhead Studios was sold to Mi-
crosoft Corp.

Molyneux is recognized as one of the com-
puter games industry’s most articulate and elo-
quent speakers on the subject of the develop-
ment of computer games. He has recently re-
ceived an honorary doctorate from the
University of Abertay and was inducted into
the Academy of Interactive Arts and Sciences
Hall of Fame. Peter was also awarded an Order
of the British Empore (OBE) in the Queen’s
2005 New Years Honours List for services to
the computer video games industry.

The Illusion of Life, Revisited

Ken Perlin (New York University)

Many years ago, Walt Disney spoke of the
quest to create the “illusion of life.” In fact in
every era of human history, this quest has
evolved new kinds of literacy, from the first
cave paintings to the written word, music, dra-
ma, cinema, animation and beyond. Recently
it has become possible to create this illusion in-
teractively. But what makes for an effective ex-
perience, once an audience can respond back?
What makes us care about an interactive char-
acter? I will show some recently developed
techniques for breathing life into interactive
characters. These techniques may point the
way to a new era where cinema intersects with
interactive narrative and on-line community.

And we’re also going to make sheep waltz.

Ken Perlin is a professor in the department
of computer science at New York University,
He was founding director of the Media Re-
search Laboratory and also directed the NYU
Center for Advanced Technology from 1994-
2004. His research interests include graphics,
animation, user interfaces, science education
and multimedia. In January 2004 he was the
featured artist at the Whitney Museum of
American Art. In 2002 he received the New
York City Mayor’s award for excellence in sci-
cence and technology and the Sokol award for
outstanding science faculty at NYU. In 1997
he won an Academy Award for technical
achievement from the Academy of Motion Pic-
ture Arts and Sciences for his noise and turbu-
lence procedural texturing techniques, which
are widely used in feature films and television.
In 1991 he received a presidential Young In-
vestigator Award from the National Science
Foundation.

Perlin received his PhD in computer science
from New York University in 1986, and a BA in theoretical mathematics from Harvard University in 1979. He was head of software development at R/GREENBERG Associates in New York, NY from 1984 through 1987. From 1979 to 1984, he was the system architect for computer generated animation at Mathematical Applications Group, Inc., Elmsford, NY, where the first feature film he worked on was TRON. He has served on the board of directors of the New York chapter of ACM/SIGGRAPH, and currently serves on the board of directors of the New York Software Industry Association.

Invited Talk by Neil Young

Neil Young (EA Los Angeles)

As vice president and general manager of EA Los Angeles (EALA), Neil Young oversees all aspects of the studio that is responsible for the blockbuster franchises, Medal of Honor, Command & Conquer, and The Lord of the Rings. Notably, Young was instrumental in securing the ground-breaking long term agreement with Academy Award winner Steven Spielberg who is currently collaborating with the game makers at EALA to create three new original franchise properties.

Prior to taking the helm of EALA, Young was general manager of the award-winning Maxis studio, where he was responsible for delivering The Sims™ 2, the sequel to the best-selling PC game of all time. In 2002 and 2003, Young led the development of the first The Lord of the Rings games at EA Redwood Shores — The Lord of the Rings, The Two Towers, and The Lord of the Rings, The Return of the King. British-born Young began his career in the interactive entertainment industry in 1988, as a programmer and then producer at UK based Imagitec & Probe Software respectively. In 1992 Young joined Virgin Interactive when he moved to the United States. At Virgin, he produced a number of Disney-licensed titles and was promoted to vice president for product development. By 1997, Young moved on from Virgin and was named vice president and general manager of ORIGIN Systems, a subsidiary of Electronic Arts. During his time at ORIGIN Systems, Young supervised the launch of the world’s first massively multiplayer online role-playing game, Ultima Online.

Since that time, Young has flourished at EA. He was the creator and driving force behind Majestic, the first Internet-based interactive game that places players in the center of an unfolding conspiracy-thriller. Majestic blurred the line between fiction and reality by engaging players through nontraditional gaming media such as the telephone, e-mail, and fax.
The distinction between contributed and invited talks applies to conferences, and not to departmental seminars. The details of who asked first, etc, are no reasonable basis for any distinction between seminar talks. Since getting yourself invited to give a seminar talk tends to be very easy, I would recommend to list them apart from invited conference talks. One can either go for "Invited talks / Contributed talks / Seminar talks" or for "Invited talks / Contributed & Seminar talks" as subcategories. Share. Improve this answer. You have already been invited to talk somewhere, that means you have something to say that people want to hear. That's your introduction. "Hi, I'll be at City, Country giving a presentation at Prestigious Institution about Topic, and I would like to take advantage of the opportunity to talk about Topic at your prestigious Institution". The existing invitation legitimizes your proposal. 1.4K views Â· Invited talk on "Machine Learning Projects in Industry". A webinar was held on 22nd of May, 2021 between 11:30am 1:30pm, in the Department of CSE. It was attended by about 85 participants. Â· An Invited Talk Series on Preparedness for Higher Education was conducted by ForeignAdmits on 8th February, 2020, Saturday from 11:30 am to 1:30 pm in Gallery Room 2, Dayananda Sagar College of Engineering as a part of ACM-W chapter. It was attended by 35 second and third year students across several departments. The 15th European Conference on Applied Superconductivity Invited Talks. EUCAS 2021 -> Programme -> Invited Talks. Detailed information will be made available later Please be sure to check back. Virtual Exhibition.