

Curriculum Vitae:

D.A. Forsyth

Birth

2 May, 1963, Cape Town, South Africa.

Degrees

1. B.Sc., Electrical Engineering, U. of the Witwatersrand, Johannesburg, 1984
2. B.Sc., Electrical Engineering, U. of the Witwatersrand, Johannesburg, 1986
3. M.A., (procedural degree), Oxford University, 1989
4. D.Phil., Oxford University, 1989

Appointments

1. Fellow, Magdalen College, Oxford, Jan. 1989-Jan. 1992
2. Assistant Professor, Dept. of Computer Science, U. of Iowa, Sept. 1991-Jul. 1994
3. Associate Professor, Dept. of Computer Science, U. of Iowa, July 1994-Jul. 1996
4. Assistant Professor, Dept. of Computer Science, U. of California, Berkeley, Jul. 1994-Jun. 1996
5. Associate Professor, Dept. of Computer Science, U. of California, Berkeley, Jul. 1996-Jun. 2002
6. Full Professor, Dept. of Computer Science, U. of California, Berkeley, Jul. 2002-Jun 2006
7. Full Professor, Dept. of Computer Science, U. of Illinois, Aug. 2004-Present
8. Fulton Watson Copp Chair in Computer Science, U. of Illinois, May 2014-Present

Honors and Awards

1. Diocesan College Rhodes Scholar, 1985
2. National Science Foundation Research Initiation Award, 1992
3. National Science Foundation Young Investigator Award, 1992
4. Marr Prize, Best Paper at 1993 ICCV, 1993
5. Best Paper in Cognitive Computer Vision, ECCV, 2002
6. Okawa Foundation Fellowship, 2003
7. IEEE Technical Achievement Award, 2006
8. IEEE Fellow, 2009
9. ACM Fellow, 2014
10. PAMI Mark Everingham Prize, 2024 (https://www.thecvf.com/?page_id=529)
“for continual advice and wisdom in overseeing the computer vision community's conferences and journals”

Consulting Activities

1. Consultant, intellectual property law firm, 1998-99
2. Consultant on retainer, FujiFilm Software CA, 2001-2006
3. Consultant, venture capital firm, 2002
4. Consultant, intellectual property law firm, 2003

5. Consultant, State's attorney's general, 2006
6. Technical Advisor, Euclid Media, 2007-2008
7. Technical Advisor, Animate-me, 2007-2008, helped them get NSF SBIR award.
8. Technical Advisor, Snap-and-buy, 2007-2008
9. Technical Advisor, Lumenous, 2015-2020, helped them get NSF SBIR award. Engaged by Lumenous, no litigation
10. Technical Advisor, Depix, 2020-2022. Engaged by Depix, no litigation.
11. Technical Advisor, Revery.ai, 2020-present. Engaged by Revery.ai, no litigation.
12. Consultant, Foley+Lardner, 2009-2010

13. Consultant, Sheridan and Ross (IP law firm), 2012-2013;
including reading, search and report preparation
14. Consultant, Fish and Richardson, 2014-2015
IpLearn-Focus, LLC vs Microsoft Corp. IPR's were IPR2015-00095; IPR2015-00096; IPR2015-00097.
15. Consultant, Irell and Manella, 2016-2018
IPR petitions; *Legend3D, Inc. v. Prime Focus Creative Services Canada Inc.*, IPR2016-00806; *Prime Focus Creative Services Canada Inc. v. Legend3D, Inc.*, IPR2016-01243; and *Prime Focus Creative Services Canada Inc. v. Legend3D, Inc.*, IPR2016-01491. Parties were: Legend 3D and Prime Focus Creative Services Canada
16. Consultant, Klarquist Sparkman, 2019-Nov. 2023
Including reading, search and report preparation for invalidity and non-infringement, for district court matter. *Kewazinga Corp. v. Microsoft Corporation*, No. 18-cv-04500, (S.D.N.Y., May 21, 2018).
Parties were: Microsoft Inc. and Kewazinga Corp. Engaged by Microsoft Corporation.
17. Consultant, Scientific Advice to Apple, 2021. Engaged by Apple, no litigation.
18. Consultant, Kerr, Russell and Weber,
2020-2022, Parties were Innovision and Autis: engaged, but only 1 hr work done. Engaged by Autis, case was: *Inovision Software Solutions, Inc. v. Autis Ingenieros, S.L.U.*, No. 19-cv-12580, (E.D. Mich, Sept. 3, 2019).
19. Consultant, Oblon, 2021,
Parties were: Eagle View Technologies Inc.; Pictometry International Corp; Nearmap US Inc; Nearmap Australia, Pty, Ltd and Nearmap Ltd. Reviewed prior art for anticipated litigation, but not aware of any filings. Engaged by: Nearmap. *Eagle View Technologies v. Nearmap US*, No. 21-cv-0283, (D. Utah, May 4, 2021)
20. Consultant, Tensegrity Law group, 2021
Parties were: Facebook, Inc.; MTA Platforms, Inc; Instagram LLC; Whatsapp, Inc; Eyesmatch, Ltd; Memomi Labs, Inc. The activities involved preparing materials for litigation and IPRs involving U.S. Patent Nos. 7,948,481; 8,624,883; 8,982,109; and 8,982,110. Litigation was: *EyesMatch Ltd. v. Facebook, Inc.*, No. 21-cv-0111, (D. Del, Jan. 28, 2021). IPRs were filed against: 7,948,481 (IPR2022-00370); 8,624,883 (IPR2022-00371); 8,982,109 (IPR2022-00489); 8,982,110 (IPR2022-00490). Engaged by: Eyesmatch
21. Consultant, Quinn Emmanuel, 2021
The matter was: Certain Barcode Scanners, Mobile Computers with Barcode Scanning Capabilities, Scan Engines, and Components Thereof (No. 337-TA-1285); *Honeywell International Inc. v. Zebra Technologies Corporation*, Nos. 6:21-cv-1008, 1010 (W.D. Tex, Sept. 29, 2021); Engaged by: Zebra Techs Corp.
22. Consultant, Fish and Richardson, 2022-2024
Including reading, search, report preparation and deposition for five IPR's:
IPR2022-00733, IPR2022-00734, IPR2022-00735, IPR2022-01090, IPR2022-01009

- Parties are: Eagle View Technologies Inc.; Pictometry International Corp; Nearmap US Inc; Nearmap Australia, Pty, Ltd and Nearmap Ltd. Engaged by: Nearmap
23. Consultant, Groombridge Wu, present
Parties are: Eagle View Technologies Inc.; Pictometry International Corp; Nearmap US Inc; Nearmap Australia, Pty, Ltd and Nearmap Ltd. Litigation is: *Eagle View Technologies v. Nearmap US*, No. 21-cv-0283, (D. Utah, May 4, 2021). Engaged by: Nearmap
24. Consultant, Tensegrity, present
EyesMatch Ltd. v. Samsung Electronics America, Inc., No. 23-cv-0363 (E.D. Tex., Aug. 8, 2023). Parties are: Eyesmatch Ltd; Samsung Electronics, Ltd. Engaged by: Eyesmatch
- 25 Consultant, BLGRP, present
Planner5D vs Meta and Princeton; Case No 3:19-CV-03132-WHO, 3:20-CV-08261-WHO; Engaged by: Planner5D

Graduated PhD Students

1. C.A. Rothwell (co advised with A. Zisserman)
2. J.Haddon
3. F.S.Cho
4. S.J. Cheney
5. S.Ioffe
6. P.Duygulu (co-advised)
7. O.Arikan
8. D.Ramanan
9. T.Berg (nee Miller)
10. J.Edwards
11. R.White
12. L.Ikemoto
13. N.Loeff
14. A.Farhadi
15. D.Tran
16. A.Sorokin
17. G.Wang
18. V.Hedau (joint with D. Hoiem)
19. B.Jones (joint with B. Bailey)
20. R.Sodhi (joint with B. Bailey)
21. K.Karsch
22. A.Sadeghi
23. Z.Liao
24. S. Singh
25. D. Tsatsoulis
26. J. Lu
27. J. Rock
28. A. Deshpande
29. M. Vasileva
30. D. Roberts (joint with M. Golparvar Fard)
31. T. Issaranon
32. M-J. Chong
33. Anand Bhattad
34. Kedan Li
35. Jeffrey Zhang
36. Fan Wu

Editorial Boards

1. Associate Editor, IEEE Trans. Multimedia
2. Editorial Board, Int. J. Computer Vision
3. Associate Editor, IEEE Trans Pattern Analysis and Machine Intelligence, 2 terms
4. Associate Editor, J. ACM, since 2011
5. Associate Editor, ACM Transactions on Graphics, since 2011
6. Editor in Chief, IEEE Trans. Pattern Analysis and Machine Intelligence, 2013-2017

Service and Administration

1. Committee member, U.C. Berkeley Committee on Admissions, Enrollment and Preparatory Education, 1995-2001 (Dealt with the University's response to the UC Regents order on affirmative action; established now well-known new admission policy for UC Berkeley, currently being taken up by other UC campuses).
2. Committee member, U.C. Berkeley Rhodes and Marshall Scholarship Committee, 1999-2003.
3. Member, National Research Council Committee on Tools and Strategies for Protecting Kids from Pornography and Their Applicability to Other Inappropriate Internet Content. (3 years of hearings, both closed and public, and an extensive report that was very well received by the popular press)
4. Founder and Member, Executive Committee of the Board, Berkeley Foundation for Opportunity in Information Technology. (Foundation seeks to ensure that Demographics of California University Computer Science Departments reflects that of the state, by helping targeted schoolchildren improve their understanding of science and their college application packets; by offering scholarships; and by various other means.)
5. Program Co-Chair: ECCV2008, CVPR 2000, CVPR2011, CVPR2018, CVPR2021
(Note: For vision conferences, program chairs cannot submit papers; PC is a major administrative task; CVPR2018 had approx. 5000 submissions and CVPR 2021 had approx. 7000 submissions)
6. General Co-Chair: CVPR2006, CVPR2015, ICCV2019
7. Senior Advisor to Program Chairs: CVPR2024, ICCV2025
8. Associate Department Chair, UIUC CS Department, 2011-2015
9. Adjunct Professor, TTIC, 2015-ongoing
10. Scientific Advisory Board, Allen Institute for Artificial Intelligence, 2015-to date
11. Scientific Advisory Board, KAUST Visual Computing Institute, 2016
12. Scientific Advisory Board, Baidu Research, 2017-2022
13. Editor in Chief, IEEE Trans. Pattern Analysis and Machine Intelligence, 2013-2017
14. Committee member, UIUC Senate Committee on Student Discipline, 2017-present
15. Ombud, CVPR, 2018-present
16. Member, 8'th Senate review commission, UIUC 2018-2019
17. Chair, UIUC Senate committee for Academic Freedom and Tenure, 2020-present
Duties included: Significant Article X Hearing (40 hours of testimony) and managing difficult academic freedom disputes
18. Technical Advisory board, Depix, 2020-2022
19. Technical advisor, Revery.ai, 2020-present
20. Moderator for Computer Vision, ArXiv, 2017(?)-present
21. Chair, search committee for EIC IEEE TPAMI, 2021

US Patents

1. US 9330500 B2 Inserting objects into content, Kevin Karsch, Varsha Chandrashekhar Hedau, David A. Forsyth, Derek Hoiem
2. US 8842118 B1 Automated image replacement using deformation and illumination estimation, Ryan White, David Forsyth
3. US 9,471,967, Relighting Fragments For Insertion Into Content, Kevin Karsch, Zicheng Liao, David Forsyth
4. US12131365B2 Search Engine Use of Neural Network Regressor for Multi-Modal Item Recommendations Based on visual Semantic Embeddings, David A. Forsyth, Ranjitha Kumar, Krishna Dusad, Kedan Li, Mariya I. Vasileva, Bryan Plummer, Yuan Shen, Shreya Rajpal

Publications

Authored books

1. Forsyth, D.A. and Ponce, J., *Computer Vision: A Modern Approach*, Prentice-Hall, 2002.
2. Forsyth, D.A. and Ponce, J., *Computer Vision: A Modern Approach*, 2002. Chinese Language Edition
3. Forsyth, D.A. and Ponce, J., *Computer Vision: A Modern Approach*, 2002. Russian Language Edition
4. Forsyth, D.A. and Ponce, J., *Computer Vision: A Modern Approach*, 2002. Japanese Language Edition
5. Forsyth, D.A., Arikan, O., Ikemoto, L., O'Brien, J., and Ramanan, D., *Computational Studies of Human Motion: Part I, Tracking and Motion Synthesis*, ISBN: 1-933019-30-1 178pp July 2006 (also available as *Foundations and Trends in Computer Graphics and Vision Volume 1 Issue 2/3* (255pp), 2006)
6. Forsyth, D.A. and Ponce, J., *Computer Vision: A Modern Approach* (2e), Prentice Hall, 2011 (heavily revised edition, about 50% new material)
7. Forsyth, D.A., *Probability and Statistics for Computer Science*, Springer Verlag, 2018
8. Forsyth, D.A., *Applied Machine Learning*, Springer Verlag, 2019

Edited books

1. *Computer Vision - ECCV 2008. 10'th European Conference on Computer Vision, Part I*, D.A. Forsyth, P.H.S. Torr and A. Zisserman, Springer Verlag LNCS 5302, 801 pp, 2008
2. *Computer Vision - ECCV 2008. 10'th European Conference on Computer Vision, Part II*, D.A. Forsyth, P.H.S. Torr and A. Zisserman, Springer Verlag LNCS 5303, 851pp., 2008
3. *Computer Vision - ECCV 2008. 10'th European Conference on Computer Vision, Part II*, D.A. Forsyth, P.H.S. Torr and A. Zisserman, Springer Verlag LNCS 5304, 893pp., 2008
4. *Computer Vision - ECCV 2008. 10'th European Conference on Computer Vision, Part II*, D.A. Forsyth, P.H.S. Torr and A. Zisserman, Springer Verlag LNCS 5305, 827pp., 2008
5. *Applications of Invariance in Computer Vision*, J.L. Mundy, A. Zisserman and D.A. Forsyth, (ed.s), Springer LNCS 825, 1994.
6. *Shape, contour and grouping in computer vision*, D.A. Forsyth, J.L. Mundy, R. Cipolla and V. DiGes'u (ed.s), Springer-Verlag LNCS 1681, 2000.

Book chapters

1. Forsyth, D.A., "Colour constancy," in Blake, A. and Troscianko, T. (eds.), *AI and the Eye*, John Wiley and Sons, 1990.
2. A. Zisserman, C.A. Rothwell, D. A. Forsyth and J. L. Mundy, "Fast Recognition using Algebraic Invariants," in Mundy, J.L and Zisserman, A. (eds.), *Applications of Invariance in computer vision*, MIT press, 1992.
3. w A. Zisserman, D. A. Forsyth, C. A. Rothwell, and J. L. Mundy, "Recognising General Curved Objects Efficiently," in Mundy, J.L and Zisserman, A. (eds.), *Applications of Invariance in computer vision*, MIT press, 1992.
4. C. Coehlo, A. Heller, J.L. Mundy, D.A.Forsyth and A. Zisserman, "An experimental evaluation of projective invariants," in Mundy, J.L and Zisserman, A. (eds.), *Applications of Invariance in computer vision*, MIT press, in print, 1992.
5. Forsyth, D.A., Mundy, J.L., Zisserman, A.P. and Rothwell, C.A. "Applications of invariant theory in vision," In Kapur, D. and Donald, B.R. (eds.), *Integrating Symbolic and Numerical Methods for Artificial Intelligence*, Academic

- Press, 1992.
6. D.A. Forsyth, "The outline of an algebraic surface yields the surface," *Design and application of curves and surfaces*, R.B. Fisher (ed.), OUP, 1994.
 7. F.S. Cho and D.A. Forsyth, "Hidden Feature Removal," *Wiley Encyclopedia of Electrical and Electronics Engineering*, vol. 8, pp. 713-725. New York: John Wiley & Sons, 1999. (invited review).
 8. D.A. Forsyth, "Foreword", in H. Aghajan and A. Cavallero, *Multi-Camera Networks*, Elsevier, 2009
 9. D.A. Forsyth and J. Malik, "Computer Vision", in S.J. Russell and P. Norvig, *Artificial Intelligence: A Modern Approach 3e*, Pearson, 2009
 10. D.A. Forsyth, T. Berg, C. Alm, A. Farhadi, J. Hockenmaier, N. Loeff, G. Wang, "Words and Pictures: Categories, Modifiers, Depiction and Iconography" in *Object Categorization: Computer and Human Vision Perspectives* S. Dickinson, A. Leonardis, B. Schiele, and M. Tarr, (eds), Cambridge University Press, 2009.
 11. D.A. Forsyth and J. Malik, "Computer Vision", in S.J. Russell and P. Norvig, *Artificial Intelligence: A Modern Approach 4e*, Pearson, 2020

Journal Articles

1. Forsyth, D.A., "A novel algorithm for colour constancy," *International Journal of Computer Vision*, 5:1, 5-36, July, 1990. Reprinted in *Physics based vision* (3 vols.), edited by S.A. Shafer, G. Healey, and L.B. Woolff, 1992.
2. Forsyth, D.A. and Zisserman, A., "Shape from shading in the light of mutual illumination," *Image and Vision Computing*, 8:1, 42-49, 1990.
3. Forsyth, D.A., Mundy, J.L., Zisserman, A.P. and Brown, C.M., "Projectively Invariant Representations Using Implicit Algebraic Curves," 9:2, 130-136, 1991.
4. Forsyth, D.A., Mundy, J.L., Zisserman, A.P., "Transformational Invariance- a primer," *Image and Vision Computing*, 10:1, 39-45, 1992.
5. s Forsyth, D.A., and Zisserman, A.P., "Reflections on Shading," *IEEE Trans. Pattern Analysis and Machine Intelligence*, Special issue on physical modeling in computer vision, 13:7, 671-679, Jul. 1991.
6. Forsyth, D.A., Mundy, J.L., Zisserman, A.P., Coelho, C., Heller, A. and Rothwell, C.A., "Invariant descriptors for 3D object recognition and pose," *IEEE Trans. Pattern Analysis and Machine Intelligence*, Special issue on 3D object recognition, 13:10, 971-991, Oct. 1991.
7. Rothwell, C.A., Zisserman, A.P., Marinos, C.I., Forsyth, D.A. and Mundy, J.L., "Relative motion and pose from arbitrary plane curves," *Image and Vision Computing*, 10:4, 250-262, 1992.
8. Rothwell, C.A., Zisserman, A., Forsyth, D.A. and Mundy, J.L., "Planar Object Recognition using Projective Shape Representation," *International J. of Computer Vision*, 16:1, 57-99, Sept. 1995.
9. Zisserman, A., Forsyth, D.A., Mundy, J.L., Rothwell, C.A., and Liu, J.S., "3D Object Recognition using Invariance," *Artificial Intelligence*, 78:1-2, 239-288, Oct. 1995.
10. Forsyth, D.A., "Recognizing Algebraic Surfaces from their Outlines," *International J. Computer Vision*, 18:1, 21-40, 1996.
11. Forsyth, D.A. and Fleck, M. M., "Automatic Detection of Human Nudes," *International J. Computer Vision*, 32:1, 63-77, Aug. 1999.
12. Chenney, S., Ichnowski, J. and Forsyth, D.A., "Dynamics modeling and culling," *IEEE Computer Graphics and Applications*, 19:2, 78-87, 1999.
13. Cho, F.S. and Forsyth, D.A., "Interactive Ray Tracing with the Visibility Complex," *Computers and Graphics*, Special Issue on Visibility - Techniques and Applications, 23:5, 703-717, 1999.
14. Forsyth, D.A., "Computer Vision Tools for Finding Images," *Library Trends, Topic: Progress in Visual Information Access and Retrieval*, 48:2, Fall 1999.
15. Stephen Chenney and D. A. Forsyth. "Sampling Plausible Solutions to Multi-Body Constraint Problems," *Proceedings of SIGGRAPH 2000*, p.219-28, 2000
16. Ioffe, S. and Forsyth, D.A., "Probabilistic methods for finding people," *International J. Computer Vision*, 43:1, 45-68, Jun. 2001.
17. Forsyth, D.A., Haddon, J., and Ioffe, S., "The Joy of Sampling," *International J. Computer Vision*, 41:1-2, 109-134, Jan. 2001.
18. O. Arikan and D.A. Forsyth, "Interactive Motion Generation from Examples," *Proc. SIGGRAPH*, 2002
19. O. Arikan, Forsyth, D.A., and J. O'Brien "Motion Synthesis from Annotations," *SIGGRAPH 2003*, San Diego, CA, Jul. 2003, in *ACM Transactions on Graphics*, vol. 33:3, 402-408, 2003
20. Barnard, K., Duygulu, P., Forsyth, D., de Freitas, N., Blei, D.M, Jordan, M. I., "Matching Words and Pictures," *Journal of Machine Learning Research*, 3(Feb):1107-1135, 2003.
21. Okan Arikan, David A. Forsyth, James F. O' Brien, "Fast and detailed approximate global illumination by irradiance decomposition," *ACM Transactions on Graphics (TOG) (SIGGRAPH 05)* Volume 24 , Issue 3 (July 2005)
22. A. Lobay and D.A. Forsyth, "Shape from Texture without Boundaries," *Int. J. Computer Vision*, 67, 1, 71-91, 2006

23. David A. Forsyth, Okan Arikan, Leslie Ikemoto, James O' Brien, Deva Ramanan, "Computational Studies of Human Motion: Part 1, Tracking and Motion Synthesis," *Foundations and Trends in Computer Graphics and Vision* Volume 1 Issue 2/3 (255pp), 2006 (also published in book form).
24. Ramanan, D.; Forsyth, D.A.; Barnard, K.; "Building models of animals from video Pattern Analysis and Machine Intelligence," *IEEE Transactions on* Volume 28, Issue 8, Aug. 2006 Page(s):1319 - 1334
25. Ramanan, D; Forsyth, D.A.; Zisserman, A; "Tracking People by Learning Their Appearance," *IEEE Transactions on Pattern Analysis and Machine Intelligence*, Volume 29, no 1, pp 65-81, 2007.
26. Ryan White, Keenan Crane, David Forsyth, "Capturing and Animating Occluded Cloth," *ACM Transaction on Graphics (SIGGRAPH)*, 2007.
27. T. Berg, A. Berg, R. White, E. Learned Miller, Y.W. The and D.A. Forsyth, "Names and Faces," accepted for publication, *IJCV* 2008
28. L. Ikemoto, O.Arikan and D.A. Forsyth, "Generalizing motion edits with Gaussian processes," *ACM Transactions on Graphics*, 2009
29. N. Ikizler and D.A. Forsyth, "Searching for Complex Human Activities with No Visual Examples," *Int. J. Computer Vision*, 2008.
30. Tamara L. Berg and Alexander Sorokin and Gang Wang and David A. Forsyth and Derek Hoiem and Ali Farhadi and Ian Endres, It's all about the data, *Proceedings of IEEE* , 2010
31. D. Forsyth, "Variable Source Shading Analysis", *Int J. Computer Vision*, Volume 91 Issue 3, February 2011
32. Anna Paviotti, David A. Forsyth and Guido M. Cortelazzo, "Lightness Recovery for Pictorial Surfaces", *Int J Computer Vision*, Vol 94, Issue 1, 2011
33. Kevin Karsch, Varsha Hedau, Derek Hoiem and D.A. Forsyth, "Rendering Synthetic objects into Legacy Photographs", *ACM Transactions on Graphics (Proc SIGGRAPH Asia)*, V 30, Issue 6, 2011
34. Gang Wang, Derek Hoiem, David Forsyth, "Learning Image Similarity from Flickr Groups Using Fast Kernel Machines," *IEEE Transactions on Pattern Analysis and Machine Intelligence (TPAMI)*, Nov. 2012.
35. Zicheng Liao, Hugues Hoppe, David Forsyth, Yizhou Yu, A subdivision-based representation for vector image editing. *IEEE Trans. Vis. Comput. Graphics*, 18(11), Nov. 2012. (Spotlight Paper)
36. Yang Wang, Duan Tran, Zicheng Liao, D.A> Forsyth, Discriminative Hierarchical Part-based Models for Human Parsing and Action Recognition, *J. Machine Learning Research* 13 (Oct) 2012, 3075-3102
37. G. Wang, D. Hoiem, D.A. Forsyth, "Improved object categorization and detection using comparative object similarity", *IEEE TPAMI* 2013, Vol. 99
38. Recognizing activities in multiple views with fusion of frame judgments Selen Pehlivan, David A. Forsyth, *Image and Vision Computing* 32 (2014) 237-249
39. Karsch, K.; Golparvar-Fard M.; Forsyth, D., "ConstructAide: Analyzing and visualizing construction sites through photographs and building models" *ACM Transactions on Graphics* (to be presented at SIGGRAPH Asia), 2014.
40. Karsch, K.; Sunkavalli, K. Hadap, S.; Carr, N.; Jin, H.; Fonte, R.; Sittig, M.; Forsyth, D. "Automatic scene inference for 3D object compositing," *ACM Transactions on Graphics* (presented at SIGGRAPH), 33, 3, 2014.
41. Du Tran, Junsong Yuan, and David Forsyth, Video Event Detection: from Subvolume Localization to Spatio-Temporal Path Search, *IEEE Transactions on Pattern Analysis and Machine Intelligence (TPAMI)*, 2014
42. Zicheng Liao, Kevin Karsch, Hongyi Zhang, D.A. Forsyth, "An Approximate Shading Model with Detail Decomposition for Object Relighting" *Int. J. Computer Vision*, 2018
43. D.A. Forsyth and Jason Rock, "Intrinsic Image Decomposition using Paradigms", *IEEE TPAMI*, November, 2022
44. Xiaoyang Bai, Zhongmin Zhu, Alexander Schwing, David Forsyth, Viktor Gruev, "Angle of polarization calibration for omnidirectional polarization cameras" *Opt Express*. 2023 Feb 13;31(4):6759-6769.
45. Kedan Li, Jeffrey Zhang, David Forsyth, "POVNet: Image-Based Virtual Try-On Through Accurate Warping and Residual" *IEEE Trans Pattern Anal Mach Intell*, accepted for publication Jun 2023
46. Xiaoyang Bai, Zuodong Liang, Zhongmin Zhu, Alexander Schwing, David Forsyth & Viktor Gruev , "Polarization-based underwater geolocalization with deep learning", *eLight* volume 3, Article number: 15 (2023)
47. Y. Shen, B. Chandaka, Z-H. Lin, A. Zhai, H. Cui, D.A. Forsyth, S. Wang, "Sim-on-Wheels: Physical World in the Loop Simulation for Self-Driving", *IEEE Robotics and Automation Letters*, Accepted for publication, 2023

Conference papers

1. Forsyth, D.A., "Finding Changes in Colour," *Proc. 1987 Alvey Vision Conference*.
2. Brady, J.M., Cameron, S.A., Durrant-Whyte, H., Fleck, M.M., Forsyth, D.A., Noble, J.A., and Page, I., "Progress towards a system that can acquire pallets and clean warehouses," *Proc. ISRR*, 1987.
3. Forsyth, D.A., "A novel approach to colour constancy," *Proc. 2nd International Conference on Computer Vision*, 9-18, 1988.
4. Forsyth, D.A. and Zisserman, A., "Mutual illumination," *Proc. IEEE conference on Computer Vision and Pattern*

- Recognition, 466-473, 1989.
5. Forsyth, D.A. and Zisserman, A., "Shape from shading in the light of mutual illumination," Proc. 5th Alvey Vision Conference, 193-198, 1989.
 6. Forsyth, D.A., Mundy, J.L., Zisserman, A.P. and Brown, C.M., "Projectively Invariant Representations Using Implicit Algebraic Curves," 1st European Conference on Machine Vision, 427-436, 1990. (also OU Internal report no: 1829/90).
 7. Forsyth, D.A., Mundy, J.L., Zisserman, A.P. and Brown, C.M., "Invariance-a neFramework for vision," 3rd International Conference on Computer Vision, Osaka, Japan, 598-605, 1990. (also OU Internal report no: 1830/90)
 8. Forsyth, D.A., Mundy, J.L., Zisserman, A.P. and Brown, C.M., "Transformational Invariance - a primer," British Machine Vision Association Conference, 1-6, 1990.
 9. Zisserman, A.P., Marinos, C.I., Forsyth, D.A., Mundy, J.L. and Rothwell, C.A., "Relative motion and pose from invariants," British Machine Vision Association Conference, 7-12, 1990.
 10. Rothwell, C.A., Zisserman, A.P., Forsyth, D.A. and Mundy, J.L., "Using Projective Invariants for constant time library indexing in model based vision," Proc. British Machine Vision Conference, 1991.
 11. Rothwell, C.A., Zisserman, A., Forsyth, D.A., and Mundy, J.L., "Canonical Frames for Planar Object Recognition," 2nd European Conference on Computer Vision, Springer Verlag Lecture Notes in Computer Science, 757-772, 1992.
 12. Rothwell, C.A., Zisserman, A., Mundy, J.L., and Forsyth, D.A., "Efficient Model Library Access by Projectively Invariant Indexing Functions," Computer Vision and Pattern Recognition 92, 109-114, 1992.
 13. Forsyth, D.A., Mundy, J.L., Zisserman, A.P., and Rothwell, C.A., "Recognising rotationally symmetric surfaces from their outlines," Proc. 2nd European Conference on Computer Vision, Santa Margherita Ligure, Italy, May 1992, 639-648, 1992.
 14. Rothwell, C.A., Forsyth, D.A., Zisserman, A., and Mundy, J.L., "Extracting projective structure from single perspective views of 3D point sets," International Conference on Computer Vision, Berlin, Germany, 573-582, 1993.
 15. Forsyth, D.A., "Recognizing Algebraic Surfaces from their Outlines," International Conference on Computer Vision, Berlin, Germany, 476-480, 1993.
 16. J. Liu, Mundy, J.L., Forsyth, D.A., Zisserman, A.P., and Rothwell, C.A., "Efficient Recognition of rotationally symmetric surfaces and straight homogenous generalized cylinders," IEEE conference on Computer Vision and Pattern Recognition '93, 1993.
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