

F1.2 (D. Gerthsen / U. Lemmer)

- [F1.2:1] A. Colsmann, J. Junge, C. Kayser, and U. Lemmer, *Organic tandem solar cells comprising polymer and small-molecule subcells*, Appl. Phys. Lett **89**, 203506 (2006)
- [F1.2:2] A. Colsmann, J. Junge, T. Wellinger, C. Kayser, and U. Lemmer, *Optimization of Electron Transport and Cathode Materials for Efficient Organic Solar Cells*, Proc. SPIE 6192, 619220 (2006)
- [F1.2:3] N. Christ, S. Kettlitz, S. Valouch, S. Züfle, C. Gärtner, M. Punke, and U. Lemmer, *Nanosecond Response of Organic Solar Cells and Photodetectors*, J. Appl. Phys. **105**, 104513 (2009)
- [F1.2:4] A. Colsmann, F. Stenzel, G. Balthasar, H. Do, and U. Lemmer, *Plasma patterning of Poly(3,4-ethylenedioxythiophene): Poly(styrenesulfonate) anodes for efficient polymer solar cells*, Thin Solid Films **517**, 1750 (2009)
- [F1.2:5] H. Do, M. Reinhard, H. Vogeler, A. Pütz, M.F.G. Klein, W. Schabel, A. Colsmann, and U. Lemmer, *Polymeric anodes from poly(3,4-ethylenedioxythiophene): poly(styrenesulfonate) for 3.5% efficient organic solar cells*, Thin Solid Films **517**, 5900 (2009)
- [F1.2:6] B. Schmidt-Hansberg, H. Do, A. Colsmann, U. Lemmer, and W. Schabel, *Drying of thin film polymer solar cells*, Eur. Phys. J. Special Topics **166**, 49 (2009)
- [F1.2:7] * B. Schmidt-Hansberg, M.F.G. Klein, K. Peters, F. Buss, J. Pfeifer, S. Walheim, A. Colsmann, U. Lemmer, P. Scharfer, and W. Schabel, *In situ monitoring the drying kinetics of knife coated polymer-fullerene films for organic solar cells*, J. Appl. Phys. **106**, 124501 (2009)
- [F1.2:8] ‡ R. Steim, S.A. Choulis, P. Schilinsky, U. Lemmer, and C.J. Brabec, *Formation and Impact of Hot-Spots on the Performance of Organic Photovoltaic Cells*, Appl. Phys. Lett. **94**, 043304 (2009)
- [F1.2:9] F. Nickel, A. Puetz, M. Reinhard, H. Do, C. Kayser, A. Colsmann, and U. Lemmer, *Cathodes Comprising Highly Conductive Poly(3,4-Ethylenedioxythiophene):Poly(Styrenesulfonate) for Semi-Transparent Polymer Solar Cells*, Organic Electronics **11**, 535 (2010)
- [F1.2:10] S. Kettlitz, S. Valouch, and U. Lemmer, *Organic solar cell degradation probed by the nanosecond photoresponse*, Appl. Phys. A **99**, 805 (2010)
- [F1.2:11] S. Züfle, N. Christ, S.W. Kettlitz, S. Valouch, and U. Lemmer, *Influence of temperature-dependent mobilities on the nanosecond response of organic solar cells and photodetectors*, Appl. Phys. Lett. **97**, 063306 (2010)
- [F1.2:12] * A. Puetz, T. Stubhan, M. Reinhard, O. Loesch, E. Hammarberg, S. Wolf, C. Feldmann, H. Kalt, A. Colsmann, and U. Lemmer, *Organic solar cells incorporating buffer layers from indium doped zinc oxide nanoparticles*, Sol. En. Mat. Sol. Cells **95**, 579 (2011)
- [F1.2:13] * M. Pfaff, E. Müller, M.F.G. Klein, A. Colsmann, U. Lemmer, V. Krzyzanek, R. Reichelt, and D. Gerthsen, *Low-energy electron scattering in carbon-based materials analyzed by scanning transmission electron microscopy and its application to sample thickness determination*, J. Microscopy **243**, 31 (2011)
- [F1.2:14] * M. Reinhard, J. Hanisch, Z.-H. Zhang, E. Ahlswede, A. Colsmann, and U. Lemmer, *Inverted organic solar cells comprising a solution-processed cesium fluoride interlayer*, Appl. Phys. Lett. **98**, 053303 (2011)
- [F1.2:15] * B. Schmidt-Hansberg, M. Baunach, J. Krenn, S. Walheim, U. Lemmer, P. Scharfer, and W. Schabel, *Spatially resolved drying kinetics of multi-component*

solution cast films for organic electronics, Chemical and Process Engineering **50**, 509 (2011)

- [F1.2:16] * M.F.G. Klein, E. Müller, M. Pfaff, J. Czolk, M. Reinhard, S. Valouch, U. Lemmer, A. Colsmann, and D. Gerthsen, *Poly(3-hexylselenophene) solar cells: Correlating the optoelectronic device performance and nanomorphology imaged by low-energy scanning transmission electron microscopy*, J. Polymer Sci. B: Polymer Phys. (2011), DOI: 10.1002/polb.22394
- [F1.2:17] A. Colsmann, A. Puetz, A. Bauer, J. Hanisch, E. Ahlswede, and U. Lemmer, *Efficient semi-transparent organic solar cells with good transparency color perception and rendering properties*, Adv. Energy Mat. **1**, 599 (2011)
- [F1.2:18] ‡ M. Sanyal, B. Schmidt-Hansberg, M.F.G. Klein, A. Colsmann, C. Munuera, A. Vorobiev, U. Lemmer, W. Schabel, H. Dosch, and E. Barrena, *In-situ x-ray study of drying temperature influence on the structural evolution of bulk heterojunction polymer-fullerene solar cells processed by doctor-blading*, Adv. Energy Mat. **1**, 363 (2011).
- [F1.2:19] ‡ M. Sanyal, B. Schmidt-Hansberg, M.F.G. Klein, C. Munuera, A. Vorobiev, A. Colsmann, U. Lemmer, W. Schabel, H. Dosch, and E. Barrena, *Effect of Photovoltaic Polymer/Fullerene Blend Composition Ratio on Microstructure Evolution during Film Solidification Investigated in Real Time by X-ray Diffraction*, Macromolecules **44**, 3795 (2011)
- [F1.2:20] N. Christ, S.W. Kettlitz, S. Züfle, S. Valouch, and U. Lemmer, *Nanosecond response of organic solar cells and photodiodes: Role of trap states*, Phys. Rev. B **83**, 195211 (2011)
- [F1.2:21] ‡ J. Yu, K. H. Lee, Y. Zhang, M.F.G. Klein, A. Colsmann, U. Lemmer, P.L. Burn, S.-C. Lo, and P. Meredith, *A dendronised polymer for bulk heterojunction solar cells*, Polym. Chem. **2**, 266 (2011)
- [F1.2:22] ‡ F.M. Pasker, M.F.G. Klein, M. Sanyal, E. Barrena, U. Lemmer, A. Colsmann, and S. Höger, *Photovoltaic Response to Structural Modifications on a Series of Conjugated Polymers Based on 2-Aryl-2H-benzotriazoles*, J. Polymer Sci. A: Polymer Chem. **49**, 5001 (2011)
- [F1.2:23] ‡ * B. Schmidt-Hansberg, M. Sanyal, M. Klein, M. Pfaff, N. Schnabel, S. Jaiser, Stefan, A. Vorobiev, E. Müller, A. Colsmann, P. Scharfer, D. Gerthsen, U. Lemmer, E. Barrena, and W. Schabel, *Moving through the phase diagram: morphology formation in solution cast polymer-fullerene-blend films for organic solar cells*, ACS Nano **5**, 8579 (2011)
- [F1.2:24] ‡ B. Schmidt-Hansberg, M. Sanyal, N. Grossiord, Y. Galagan, M. Baunach, M. F.G. Klein, A. Colsmann, P. Scharfer, Uli Lemmer, H. Dosch, J. Michels, E. Barrena, and W. Schabel, *Investigation of non-halogenated solvent mixtures for high throughput fabrication of polymer-fullerene solar cells*, Sol. En. Mat. Sol. Cells **96** 195 (2011)
- [F1.2:25] * A. Colsmann, M. Reinhard, T.-H. Kwon, C. Kayser, F. Nickel, U. Lemmer, Noel Clark, J. Jasieniak, A. Holmes, and D. Jones, *Inverted semi-transparent organic solar cells with spray coated, surfactant free polymer top-electrodes*, Sol. En. Mat. Sol. Cells (2011), DOI:10.1016/j.solmat.2011.10.016 (2011)
- [F1.2:26] ‡ J.D. Yuen, R. Kumar, J. Seifert, S. Valouch, D. Zakhidov, D. Moses, U. Lemmer, A.J. Heeger, and F. Wudl, *Observations of PDDTT Subject to Thermal Treatment: Correlation between Performance and Order*, J. Am. Chem. Soc. **133**, 19602 (2011)