

• PUBLICATIONS AND PRESENTATIONS

Papers with Peer reviews in major international scientific journals

1. L.G.D. Hawke, M. Ahmadi, H. Goldansaz and E. van Ruymbeke, Viscoelastic properties of linear associating poly(n-butyl acrylate) chains, accepted in Journal of Rheology, 2016.
2. M Ahmadi, LGD Hawke, H Goldansaz, E van Ruymbeke, Dynamics of entangled linear supramolecular chains with sticky side groups: influence of hindered fluctuations, accepted in Macromolecules, 2015
3. H. Goldansaz, Q. Voleppe, S. Pioge, C.A. Fustin, J.F. Gohy, J. Brassinne, E. van Ruymbeke, Controlling the melt rheology of linear entangled metallo-supramolecular polymers, Soft Matter, [EMERGING INVESTIGATORS THEMED ISSUE](#), 11 (4), 762, 2015.
4. H. Goldansaz, F. Goharpey, F. Afshar-Taromi, I. Kim, F. Stadler, E. van Ruymbeke, V. Karimkhani, Anomalous Rheological Behavior of Dendritic Nanoparticle/Linear Polymer Nanocomposites. Macromolecules, 48, 3368, 2015.
5. A. Shabbir, H. Goldansaz, O. Hassager, E. van Ruymbeke, N. Alvarez, Effect of Hydrogen Bonding on Linear and Nonlinear Rheology of Entangled Polymer Melts, Macromolecules, 48(16), 5988, 2015.
6. H. Goldansaz, E. van Ruymbeke, J.F. Gohy, C.A. Fustin, M. Ries, C. Bailly, Local Molecular Dynamics and Heterogeneity in PEO– NiCl₂Supramolecular Networks. Macromolecules, 48, 2290, 2015.
7. H. Goldansaz, D. Auhl, B. Goderis, Q. Voleppe, C.A. Fustin, J.F. Gohy, C. Bailly, E. Van Ruymbeke, Transient Metallo-supramolecular Networks Built from Entangled Melts of Poly(ethylene oxide). Macromolecules, 48, 3746, 2015.
8. E van Ruymbeke, V Schetnikava, Y Matsumiya, H Watanabe, Dynamic dilution effect in binary blends of linear polymers with well-separated molecular weights, Macromolecules 47(21), 7653-7665, 2014.
9. V Shchetnikava, JJM Slot, E van Ruymbeke, A Comparison of Tube Model Predictions of the Linear Viscoelastic Behavior of Symmetric Star Polymer Melts, macromolecules, 2014.
10. ME Shivokhin, E Van Ruymbeke, C Bailly, D Kouloumasis, N. Hadjichristidis, A.E. Likhtman, Understanding Constraint Release in Star/Linear Polymer Blends, Macromolecules 47 (7), 2451-2463, 2014.
11. E van Ruymbeke, H Lee, T Chang, A Nikopoulou, N Hadjichristidis, F. Snijkers, D. Vlassopoulos, Molecular rheology of branched polymers: decoding and exploring the role of architectural dispersity through a synergy of anionic synthesis, interaction chromatography, rheometry and modeling, Soft Matter, 2014.
12. Y. Matsumiya, Y. Masubuchi, T. Inoue, O. Urakawa, C.Y. Liu, E. van Ruymbeke, H. Watanabe, Dielectric and Viscoelastic Behavior of Star-Branched Polyisoprene: Two Coarse-Grained Length Scales in Dynamic Tube Dilution. Macromolecules, 47, 7637, 2014.
13. H Watanabe, Y Matsumiya, E Van Ruymbeke, Component Relaxation Times in Entangled Binary Blends of Linear Chains: Reptation/CLF along Partially or Fully Dilated Tube, Macromolecules 46 (23), 9296-9312, 2013.
14. J Brassinne, AM Stevens, E Van Ruymbeke, JF Gohy, CA Fustin, Hydrogels with Dual Relaxation and Two-Step Gel–Sol Transition from Heterotelechelic Polymers, Macromolecules 46 (22), 9134-9143, 2013.
15. E Van Ruymbeke, JJM Slot, M Kapnistos, PAM Steeman, Structure and rheology of branched polyamide 6 polymers from their reaction recipe, Soft Matter 9 (29), 6921-6935, 2013.
16. JJM Slot, E Van Ruymbeke, PAM Steeman, Composition and rheology of polyamide-6 obtained by using bi- and tri-functional coupling agents, Chinese Journal of Polymer Science 31 (1), 58-70, 2013
17. E. van Ruymbeke, Y. Masubuchi, H. Watanabe, Effective Value of the Dynamic Dilution Exponent in Bidisperse Linear Polymers: from 1 to 4/3, Macromolecules, 45, 2085-2098, 2012.
18. F. Snijkers, E. van Ruymbeke, P. Kim, H. Lee, A. Nikopoulou, T. Chang, N. Hadjichristidis, J. Pathak, D. Vlassopoulos, Architectural Dispersity in Model Branched Polymers: Analysis and Rheological Consequences, Macromolecules, 44 (21), 8631-8643, 2011.

19. M. Ahmadi, C. Bailly, R. Keunings, M. Nekoomanesh, E. van Ruymbeke, Time Marching Algorithm for Predicting the Linear Rheology of Monodisperse Comb Polymer Melts, *Macromolecules*, 44 (3), 647-659, 2011.
20. E. van Ruymbeke, E.B. Muliawan, D., H. Gao, K. Matyjaszewski, Melt rheology of star polymers with large number of small arms, prepared by crosslinking poly(n-butyl acrylate) macromonomers via ATRP, *European Polymer Journal*, 4, 746-751, 2011.
21. E. van Ruymbeke, D. Vlassopoulos, M. Kapnistos, C.Y. Liu, C. Bailly, Proposal to Solve Time-Stress Discrepancy of Tube Models, *Macromolecules*, 43,525-531, 2010.
22. E. van Ruymbeke, A. Pamvouxoglou, D. Vlassopoulos, G. Petekidis, G. Mountrichas, S. Pispas, Stable responsive diblock copolymer micelles for rheology control, *Soft Matter*, 6, 881-891, 2010.
23. E. van Ruymbeke, L. Balacca, S. Coppola, S. Righi, D. Vlassopoulos, Decoding the viscoelastic response of polydisperse star/linear polymer blends, *Journal of Rheology*, 54, 507-538, 2010.
24. E. van Ruymbeke, D. Vlassopoulos, M. Mierzwa, T. Pakula, D. Charalabidis, M. Pitsikalis, and N. Hadjichristidis, Rheology and Structure of Telechelic Linear and Star Polyisoprene Melts, *Macromolecules*, 43, 4401-4411, 2010.
25. **PUBLICATION AWARD OF THE SOCIETY OF RHEOLOGY, 2011**: E. van Ruymbeke, E. B. Muliawan, T. Watanabe, S. G. Hatzikiriakos, A. Hirao, D. Vlassopoulos, Viscoelasticity and extensional rheology of model Cayley-tree polymers of different generations, *Journal of Rheology*, 54, 642-662, 2010.
26. E. van Ruymbeke, J. Nielsen, O. Hassager, Non-linear rheology of bidisperse linear polymers: mixing law and tube pressure effects, *Journal of Rheology*, 54, 1155-1172, 2010.
27. F.J. Stadler, E. van Ruymbeke, An Improved Method to Obtain Direct Rheological Evidence of Monomer Density Reequilibration for Entangled Polymer Melts, *Macromolecules*, 43, 21, 9205-9209, 2010.
28. J.T. Padding, E. van Ruymbeke, D. Vlassopoulos and W.J. Briels, Computer simulation of the rheology of concentrated star polymer suspensions, *Rheol. Acta*, 49, 473-484, 2010.
29. H. Watanabe; Y. Matsumiya; E. van Ruymbeke, D. Vlassopoulos, N. Hadjichristidis, Viscoelastic and dielectric relaxation of a Cayley-tree-type polyisoprene: Test of molecular picture of dynamic tube dilation, *Macromolecules* 41, 16, 6110-6124, 2008.
30. E. van Ruymbeke, K. Orfanou, M. Kapnistos, H. Iatrou, M. Pitsikalis, N. Hadjichristidis, D. J. Lohse, and D. Vlassopoulos, Entangled dendritic polymers and beyond: Rheology of symmetric Cayley-tree polymers and macromolecular self-assemblies, *Macromolecules*, 40, 5941-5952, 2007.
31. E. van Ruymbeke, M. Kapnistos, D. Vlassopoulos, TZ Huang, DM Knauss, Linear melt rheology of pom-pom polystyrenes with unentangled branches, *Macromolecules* 40 (5): 1713-1719, 2007.
32. E. van Ruymbeke, C. Bailly, R. Keunings, D. Vlassopoulos, A general methodology to predict the linear rheology of branched polymers, *Macromolecules* 39 (18): 6248-6259, 2006.
33. E. van Ruymbeke, A. Kaivez, A. Hagenaaers, D. Daoust, P. Godard, R. Keunings, C. Bailly, Characterization of sparsely long chain branched polycarbonate by a combination of solution, rheology and simulation methods, *Journal of Rheology*, 50 (6): 949-973, 2006.
34. C.Y. Liu, J.S. He, E. van Ruymbeke, R. Keunings, C. Bailly, Evaluation of different methods for the determination of the plateau modulus and the entanglement molecular weight, *Polymer*, 47 (13): 4461-4479, 2006.
35. E. van Ruymbeke, V. Stéphenne, D. Daoust, P. Godard, R. Keunings, C. Bailly, New Method to detect very low levels of Long Chain Branching in High Density Polyethylene, *Journal of Rheology*, 49(6), 1503-1520, 2005.

36. E. van Ruymbeke, R. Keunings, C. Bailly, Prediction of linear viscoelastic properties for polydisperse mixtures of entangled star and linear polymers: Modified tube-based model and comparison with experimental results, *J. Non-Newtonian Fluid Mech.*, Vol. 128, 7-22, 2005.
37. E. van Ruymbeke, R. Keunings, V. Stéphenne, A. Hagenars, C. Bailly, Evaluation of Reptation Models for Predicting the Linear Viscoelastic Properties of Entangled Linear Polymers, *Macromolecules*, Vol. 35, 2689-2699, 2002.
38. E. van Ruymbeke, R. Keunings, C. Bailly, Determination of the Molecular Weight Distribution of Entangled Linear Polymers from Linear Viscoelasticity Data, *J. Non-Newtonian Fluid Mech.*, Vol. 105, 153-175, 2002.

Book chapter :

Quantitative tube model predictions for the linear viscoelasticity of linear polymers, E van Ruymbeke, CY Liu, C Bailly, *Rheology Reviews* 2007, 53–134.