

# Publication list Frank Gabel

## 2018

Ashkar, R., Bilheux, H.Z., Bordallo, H., Briber, R., Callaway, D.J.E., Cheng, X., Chu, X.Q., Curtis, J.E., Dadmun, M., Fenimore, P., Fushman, D., Gabel, F., Gupta, K., Herberle, F., Heinrich, F., Hong, L., Katsaras, J., Kelman, Z., Kharlampieva, E., Kneller, G.R., Kovalevsky, A., Krueger, S., Langan, P., Lieberman, R., Liu, Y., Losche, M., Lyman, E., Mao, Y., Marino, J., Mattos, C., Meilleur, F., Moody, P., Nickels, J.D., O'Dell, W.B., O'Neill, H., Perez-Salas, U., Peters, J., Petridis, L., Sokolov, A.P., Stanley, C., Wagner, N., Weinrich, M., Weiss, K., Wymore, T., Zhang, Y. and Smith, J.C. (2018) Neutron scattering in the biological sciences: progress and prospects. *Acta Crystallogr. D Struct. Biol.* 74(Pt 12), 1129-1168.

\*Dias Mirandela, G., Tamburrino, G., Ivanović, M., Strnad, F., Byron, O., Rasmussen, T., Hoskisson, P., Hub, J., Zachariae, U., Gabel, F. and Javelle, A. (2018) Merging In-Solution X-Ray and Neutron Scattering Data Allows Fine Structural Analysis of Membrane-Protein Detergent Complexes. *J. Phys. Chem. Lett.* 9, 3910-3914.

Kooshapur, H., Choudhury, N. R., Simon, B., Mühlbauer, M., Jussupow, A., Fernandez, N., Jones, A. N., Dallmann, A., Gabel, F., Camilloni, C., Michlewski, G., Caceres, J. F. and Sattler, M. (2018) Structural basis for terminal loop recognition and stimulation of pri-miRNA-18a processing by hnRNP A1. *Nat. Commun.* 9(1), 2479.

\*Mahieu, E. and Gabel, F. (2018) Biological small angle neutron scattering: recent results and developments. *Acta Crystallogr. D Biol. Crystallogr.* [in press]

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\*Gabel, F. (2017) Applications of SANS to study membrane protein systems. *Adv. Exp. Med. Biol.* 1009, 201-214.

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Sonntag, M., Jagtap, P., Simon, B., Appavou, M.-S., Geerlof, A., Stehle, R., Gabel, F., Hennig, J. and Sattler, M. (2017) Segmental, domain-selective perdeuteration and small angle neutron scattering for structural analysis of multi-domain proteins. *Angew. Chem. Int. Ed.* 56(32), 9322-9325.

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\*Kim, H., Martel, A., Girard, E., Moulin, M., Härtlein, M., Madern, D., Blackledge, M., Franzetti, B. and Gabel, F. (2016) SAXS/SANS on Supercharged Proteins Reveals Residue-Specific Modifications of the Hydration Shell. *Biophys. J.* 110(10), 2185-2194.

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\*Gabel, F., Lensink, M.F., Clantin, B., Jacob-Dubuisson, F., Villeret, V. and Ebel, C. (2014) Probing the conformation of the membrane protein FhaC with small angle neutron scattering and molecular modelling. *Biophys. J.* 107(1), 185-196.

Jie-rong Huang, J.-R., Warner, L., Sanchez, C., Gabel, F., Madl, T., Mackereth, C.D., Sattler, M. and Blackledge, M. (2014) Mapping the dynamic conformational equilibrium of the multi-domain splicing factor U2AF65 using NMR and SAXS. *J. Am. Chem. Soc.* 136(19), 7068-7076.

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Appolaire, A., Rosenbaum, E., Durá, M.A., Colombo, M., Marty, V., Noirclerc Savoye, M.N., Godfroy, A., Schoehn, G., Girard, E., Gabel, F. and Franzetti, B. (2013) *Pyrococcus horikoshii* TET2 peptidase assembling process and associated functional regulation. *J. Biol. Chem.* 288(31), 22542-22554.

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## 2012

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