Biography

Profesor Mark Molloy's expertise is centred on the development and application of proteomic analyses for addressing problems in the life-sciences. His expertise in the use of mass spectrometry as the core analytical technique supports collaborative research in many science and biomedical areas, where he has a particularly strong focus towards translational cancer research. A major theme has been development of new mass spectrometry workflows for quantitative targeted proteomic analyses. This has enabled investigation of important questions such as the molecular characterisation of colon, thyroid and pancreatic cancers, melanomas and some lung cancers. The information has been used to identify prognostic and predictive protein biomarkers. More recently, he has opened a new research direction to use high resolution mass spectrometry for pharmacokinetic monitoring of cancer drug levels in cancer patients and is explore analysis from dried blood spots.

Mark's leadership and international standing in the application of proteomics is evidenced by outstanding grant success (career total $42.9M), publications (>150), Scopus citations (>5,000) and HDR student completions (14). He was Director of the Australian Proteome Analysis Facility 2010-18 where his team provided expertise and world-class proteomic infrastructure to ~100 external academic and industry end-users each year.

Mark completed his PhD in proteomic sciences at Macquarie University under the supervision of Keith Williams before conducting post-doctoral research at the University of Michigan Medical School in Ann Arbor, USA. He then worked in the US pharmaceutical industry at Pfizer Inc for four years. He returned to Australia to carry out a National Health and Medical Research Council career development award fellowship on colorectal cancer (CRC) biomarker proteins before becoming Director of APAF.

He is an Honorary Professor in the Department of Molecular Sciences and Professor at The University of Sydney.

Research output

**Plasma glial fibrillary acidic protein in autosomal dominant Alzheimer's disease: associations with Aβ-PET, neurodegeneration, and cognition**

Chatterjee, P., Vermunt, L., Gordon, B. A., Pedrini, S., Boonkamp, L., Armstrong, N. J., Xiong, C., Singh, A. K., Li, Y., Sohrabi, H. R., Taddei, K., Molloy, M., Benzinger, T. L. S., Morris, J. C., Karch, C., Berman, S., Chhatwal, J., Cruchaga, C., Graff-Radford, N. R., Day, G. S., & 19 others

Farlow, M., Fox, N., Goate, A., Hassenstab, J., Lee, J. H., Levin, J., McDade, E., Mori, H., Perrin, R., Sanchez-Valle, R., Schofield, P. R., Levey, A., Jucker, M., Masters, C. L., Fagan, A. M., Bateman, R. J., Martins, R. N., Teunissen, C. & Dominantly Inherited Alzheimer Network. Jul 2023, In: Alzheimer's and Dementia. 19, 7, p. 2790-2804 15 p.

**Plasma Aβ42/40 ratio, p-tau181, GFAP and NFL across the Alzheimer's disease continuum: a cross-sectional and longitudinal study in the AIBL cohort**

Chatterjee, P., Pedrini, S., Doecke, J. D., Thota, R., Villemagne, V. L., Dow, V., Singh, A. K., Wang, P., Rainey-Smith, S., Fowler, C., Taddei, K., Sohrabi, H. R., Molloy, M. P., Ames, D., Maruff, P., Rowe, C. C., Masters, C. L., Martins, R. N. & The AIBL Research Group. Apr 2023, In: Alzheimer's and Dementia. 19, 4, p. 1117-1134 18 p.

**Integrative omics identifies conserved and pathogen-specific responses of sepsis-causing bacteria**

Mu, A., Klare, W. P., Baines, S. L., Ignatius Pang, C. N., Guérillot, R., Harbison-Price, N., Keller, N., Wilksch, J., Nhu, N. T. K., Phan, M-D., Kellar, B., Nijagal, B., Tull, D., Dayalan, S., Chua, H. H. C., Skoneczny, D., Koval, J., Hachani, A., Shah, A. D., Neha, N., & 71 others

Farlow, M., Fox, N., Goate, A., Hassenstab, J., Lee, J. H., Levin, J., McDade, E., Mori, H., Perrin, R., Sanchez-Valle, R., Schofield, P. R., Levey, A., Jucker, M., Masters, C. L., Fagan, A. M., Bateman, R. J., Martins, R. N., Teunissen, C. & Dominantly Inherited Alzheimer Network. Jul 2023, In: Alzheimer's and Dementia. 19, 7, p. 2790-2804 15 p.
One step forward with dry surface biofilm (DSB) of *Staphylococcus aureus*: TMT-based quantitative proteomic analysis reveals proteomic shifts between DSB and hydrated biofilm
Rahman, M. A., Amirkhani, A., Parvin, F., Chowdhury, D., Molloy, M. P., Deva, A. K., Vickery, K. & Hu, H., 13 Oct 2022, In: International Journal of Molecular Sciences. 23, 20, p. 1-17 17 p., 12238.

Proteome of *Staphylococcus aureus* biofilm changes significantly with aging
Rahman, M. A., Amirkhani, A., Chowdhury, D., Mempin, M., Molloy, M. P., Deva, A. K., Vickery, K. & Hu, H., 8 Jun 2022, In: International Journal of Molecular Sciences. 23, 12, p. 1-16 16 p., 6415.

SERS characterization of colorectal cancer cell surface markers upon anti-EGFR treatment
Lyu, N., Pedersen, B., Shklovskaya, E., Rizos, H., Molloy, M. P. & Wang, Y., Jun 2022, In: Exploration. 2, 3, p. 1-10 10 p., 20210176.

Proteomic analysis of whole blood using volumetric absorptive microsampling for precision medicine biomarker studies
Molloy, M. P., Hill, C., O'Rourke, M. B., Chandra, J., Steffen, P., McKay, M. J., Pascovici, D. & Herbert, B. R., 1 Apr 2022, In: Journal of Proteome Research. 21, 4, p. 1196-1203 8 p.

Overlapping genes in natural and engineered genomes
Wright, B. W., Molloy, M. P. & Jaschke, P. R., Mar 2022, In: Nature Reviews Genetics. 23, 3, p. 154-168 15 p.

Highly specific detection of KRAS single nucleotide polymorphism by asymmetric PCR/SERS assay
Lyu, N., Rajendran, V. K., Li, J., Engel, A., Molloy, M. P. & Wang, Y., 21 Sep 2021, In: The Analyst. 146, 18, p. 5714-5721 8 p.

ALS/FTD-causing mutation in cyclin F causes the dysregulation of SFPQ
Rayner, S. L., Cheng, F., Hogan, A. L., Grima, N., Yang, S., Ke, Y. D., Au, C. G., Morsch, M., De Luca, A., Davidson, J. M., Molloy, M. P., Shi, B., Ittner, L. M., Blair, I., Chung, R. S. & Lee, A., 1 Jun 2021, In: Human Molecular Genetics. 30, 11, p. 971-984 14 p.

Proteome analysis of human adipocytes identifies depot-specific heterogeneity at metabolic control points
Rajendiran, A., Krisp, C., De Souza, D. P., Ooi, G., Burton, P. R., Taylor, R. A., Molloy, M. P. & Watt, M. J., Jun 2021, In: American journal of physiology - endocrinology and metabolism. 320, 6, p. E1068-E1084 17 p.

Identification of a novel ciprofloxacin tolerance gene, aciT, which contributes to filamentation in *Acinetobacter baumannii*
Naidu, V., Shah, B., Kamath, K. S., Chien, A., Nagy, S., Pokhrel, A., Molloy, M., Hassan, K. A. & Paulsen, I. T., May 2021, In: Antimicrobial Agents and Chemotherapy. 65, 6, p. 1-9 9 p., e01400.

Proteomic and transcriptomic analysis of *Microviridae* φX174 infection reveals broad upregulation of host *Escherichia coli* membrane damage and heat shock responses
Wright, B. W., Logel, D. Y., Mirzai, M., Pascovici, D., Molloy, M. P. & Jaschke, P. R., May 2021, In: mSystems. 6, 3, p. 1-18 18 p., e00046-21.

Inhibitor of Differentiation 4 (ID4) represses mammary myoepithelial differentiation via inhibition of HEB
Holliday, H., Roden, D., Junankar, S., Wu, S. Z., Baker, L. A., Krisp, C., Chan, C-L., McFarland, A., Skhinias, J. N., Cox, T. R., Pal, B., Huntington, N. D., Ormandy, C. J., Carroll, J. S., Visvader, J., Molloy, M. P. & Swarbrick, A., 19 Feb 2021, In: iScience. 24, 2, p. 1-17 41 p., 102072.

Presymptomatic Dutch-type hereditary cerebral amyloid angiopathy related blood metabolite alterations
Chatterjee, P., Fagan, A. M., Xiong, C., McKay, M., Bhatnagar, A., Wu, Y., Singh, A. K., Taddei, K., Martins, I., Gardener, S. L., Molloy, M. P., Multhaup, G., Masters, C. L., Schofield, P. R., Benzinger, T. L. S., Morris, J. C., Bateman, R. J., Greenberg, S. M., Weimer, M. J. H., van Buchem, M. A., & 3 othersSohrabi, H., Martins, R. N. & Dominantly Inherited Alzheimer Network (DIAN), 19 Jan 2021, In: Journal of Alzheimer's Disease. 79, 2, p. 895-903 9 p., 20-1287.
Quantitative proteomic profiling of small molecule treated mesenchymal stem cells using chemical probes
Santos, J., Dolai, S., O’ourke, M. B., Liu, F., Padula, M. P., Molloy, M. P. & Milthorpe, B. K., 1 Jan 2021, In: International Journal of Molecular Sciences. 22, 1, p. 1-20 20 p., 160.

Differential regulation of extracellular matrix proteins in three recurrent liver metastases of a single patient with colorectal cancer
Voß, H., Wurlitzer, M., Smit, D. J., Ewald, F., Alawi, M., Spohn, M., Indenbirken, D., Omid, M., David, K., Juhl, H., Simon, R., Sauter, G., Fischer, L., Izbicki, J. R., Molloy, M. P., Nashan, B., Schlüter, H. & Jücker, M., Dec 2020, In: Clinical and Experimental Metastasis. 37, 6, p. 649-656 8 p.

Genome modularization reveals overlapped gene topology is necessary for efficient viral reproduction
Wright, B. W., Ruan, J., Molloy, M. P. & Jaschke, P. R., 20 Nov 2020, In: ACS Synthetic Biology. 9, 11, p. 3079-3090 12 p.

Differential regulation of extracellular matrix proteins in three recurrent liver metastases of a single patient with colorectal cancer
Voß, H., Wurlitzer, M., Smit, D. J., Ewald, F., Alawi, M., Spohn, M., Indenbirken, D., Omid, M., David, K., Juhl, H., Simon, R., Sauter, G., Fischer, L., Izbicki, J. R., Molloy, M. P., Nashan, B., Schlüter, H. & Jücker, M., Dec 2020, In: Clinical and Experimental Metastasis. 37, 6, p. 649-656 8 p.

PSMD11, PTPRM and PTPRB as novel biomarkers of pancreatic cancer progression
Sahni, S., Krisp, C., Molloy, M. P., Nahm, C., Maloney, S., Gillson, J., Gill, A. J., Samra, J. & Mittal, A., Nov 2020, In: Biochimica et Biophysica Acta - General Subjects. 1864, 11, p. 1-6 6 p., 129682.

Evaluating bioanalytical capabilities of paper spray ionization for abiraterone drug quantification in patient plasma
Bhatnagar, A., McKay, M. J., Arasaratnam, M., Crumbaker, M., Gurney, H. & Molloy, M. P., Oct 2020, In: Journal of Mass Spectrometry. 55, 10, p. 1-8 8 p., e4584.

Changes in dietary fiber intake in mice reveal associations between colonic mucin O-glycosylation and specific gut bacteria
Gamage, H. K. A. H., Chong, R. W. W., Bucio-Noble, D., Kautto, L., Hardikar, A. A., Ball, M. S., Molloy, M. P., Packer, N. H. & Paulsen, I. T., 29 Sep 2020, In: Gut Microbes. 12, 1, p. 1-15 15 p., e1802209.

Multiplex detection of ctDNA mutations in plasma of colorectal cancer patients by PCR/SERS assay
Lyu, N., Rajendran, V. K., Diefenbach, R. J., Charles, K., Clarke, S. J., Engel, A., Sydney 1000 Colorectal Cancer Study Investigators, Rizos, H., Molloy, M. & Wang, Y., 25 Aug 2020, In: Nanotheranostics. 4, 4, p. 224-232 9 p.

Proteogenomic analysis of Inhibitor of Differentiation 4 (ID4) in basal-like breast cancer
Baker, L. A., Holliday, H., Roden, D., Krisp, C., Wu, S. Z., Junankar, S., Serandour, A. A., Mohammed, H., Nair, R., Sankaranarayanan, G., Law, A. M. K., McFarland, A., Simpson, P. T., Lakhani, S., Dodson, E., Selinger, C., Anderson, L., Samimi, G., Hacker, N. F., Lim, E., & 10 others Ormandy, C. J., Naylor, M. J., Simpson, K., Nikolic, I., O’Toole, S., Kaplan, W., Cowley, M. J., Carroll, J. S., Molloy, M. & Swarbrick, A., 11 Jun 2020, In: Breast cancer research : BCR. 22, p. 1-18 18 p., 63.

BioID analysis of the cyclin F interactome reveals that ALS-variant cyclin F alters the homeostasis of paraspeckle-associated proteins
Rayner, S. L., Cheng, F., Yang, S., Grima, N., Ke, Y. D., Au, C. G., Morsch, M., Luca, A. D., Davidson, J. M., Molloy, M. P., Shi, B., Ittner, L. M., Blair, I., Chung, R. S. & Lee, A., 1 May 2020, (In preparation) In: bioRxiv.

PGRMC1 phosphorylation affects cell shape, motility, glycolysis, mitochondrial form and function, and tumor growth
Thejer, B. M., Adhikary, P. P., Kaur, A., Teakel, S. L., Van Oosterum, A., Sethi, I., Pajic, M., Hannan, K. M., Pavy, M., Poh, P., Jazayeri, J. A., Zaw, T., Pascoveci, D., Ludescher, M., Pawlak, M., Cassano, J. C., Turnbull, L., Jazayeri, M., James, A. C., Coorey, C. P., & 11 others Roberts, T. L., Kinder, S. J., Hannan, R. D., Patrick, E., Molloy, M. P., New, E. J., Fehm, T. N., Neubauer, H., Goldys, E. M., Weston, L. A. & Cahill, M. A., 3 Apr 2020, In: BMC Molecular and Cell Biology. 21, p. 1-24 24 p., 24.

The prognostic role of inflammatory markers in patients with metastatic colorectal cancer treated with bevacizumab: a translational study [ASCENT]
Clarke, S., Burge, M., Feeney, K., Gibbs, P., Jones, K., Marx, G., Molloy, M. P., Price, T., Reece, W. H. H., Segelov, E. & Tebbutt, N. C., 6 Mar 2020, In: PLoS ONE. 15, 3, p. 1-11 11 p., e0229900.

Identification of novel biomarkers in pancreatic tumor tissue to predict response to neoadjuvant chemotherapy
Sahni, S., Nahm, C., Krisp, C., Molloy, M. P., Mehta, S., Maloney, S., Itchins, M., Pavlakis, N., Clarke, S., Chan, D., Gill, A. J., Howell, V. M., Samra, J. & Mittal, A., 4 Mar 2020, In: Frontiers in Oncology. 10, p. 1-10 10 p., 237.
**Omixlitminer: a bioinformatics tool for prioritizing biological leads from omics data using literature retrieval and data mining**

Steffen, P., Wu, J., Hariharan, S., Voss, H., Raghunath, V., Molloy, M. P. & Schützer, H., Feb 2020, In: International Journal of Molecular Sciences. 21, 4, p. 1-11 11 p., 1374.

**ELF5 modulates the estrogen receptor cistrome in breast cancer**

Piggin, C. L., Roden, D. L., Law, A. M. K., Molloy, M. P., Krisp, C., Swarbrick, A., Naylor, M. J., Kalyuga, M., Kaplowitz, V., Oakes, S. R., Gallego-Ortega, D., Clark, S. J., Carroll, J. S., Bartonicek, N. & Ormandy, C. J., 2 Jan 2020, In: PLoS Genetics. 16, 1, p. 1-24 24 p., e1008531.

**Radiation-stimulated translocation of CD166 and CRYAB to the endothelial surface provides potential vascular targets on irradiated brain arteriovenous malformations**

McRobb, L. S., McKay, M. J., Gauden, A. J., Lee, V. S., Subramanian, S., Thomas, S. G., Wiedmann, M. K. H., Moutrie, V., Grace, M., Zhao, Z., Molloy, M. P. & Stoodley, M. A., Dec 2019, In: International Journal of Molecular Sciences. 20, 23 , p. 1-13 13 p., 5830.

**Protein paucimannosylation is an enriched N-glycosylation signature of human cancers**

Chatterjee, S., Lee, L. Y., Kawahara, R., Abrahams, J. L., Adamczyk, B., Anugraham, M., Ashwood, C., Sumer-Bayraktar, Z., Briggs, M. T., Chik, J. H. L., Everest-Dass, A., Föster, S., Hinneburg, H., Leite, K. R. M., Loke, I., Mögginger, U., Moh, E. S. X., Nakano, M., Recuero, S., Sethi, M. K., & 14 others Srougi, M., Stavenhagen, K., Venkatakrishnan, V., Wongtrakul-Kish, K., Diestel, S., Hoffmann, P., Karlsson, N. G., Kolarich, D., Molloy, M. P., Muders, M. H., Oehler, M. K., Packer, N. H., Palmisano, G. & Thaysen-Andersen, M., Nov 2019, In: Proteomics. 19, 21-22, p. 1-13 13 p., 1900010.

**Bioanalytical evaluation of dried plasma spots for monitoring of abiraterone and Δ(4)-abiraterone from cancer patients**

Bhatnagar, A., McKay, M. J., Thaysen-Andersen, M., Arasaratnam, M., Crumbaker, M., Gurney, H. & Molloy, M. P., 15 Sep 2019, In: Journal of Chromatography B: Analytical Technologies in the Biomedical and Life Sciences. 1126-1127, p. 1-9 9 p., 121741.

**Proteomic screen with the proto-oncogene beta-catenin identifies interaction with Golgi coatomer complex I**

Semaan, C., Henderson, B. R. & Molloy, M. P., Sep 2019, In: Biochemistry and Biophysics Reports. 19, p. 1-6 6 p., 100662.

**Inter- and intra-patient variability in pharmacokinetics of abiraterone acetate in metastatic prostate cancer**

Arasaratnam, M., Crumbaker, M., Bhatnagar, A., McKay, M. J., Molloy, M. P. & Gurney, H., Jul 2019, In: Cancer Chemotherapy and Pharmacology. 84, 1, p. 139-146 8 p.

**Using proteomics to identify ubiquitin ligase-substrate pairs: how novel methods may unveil therapeutic targets for neurodegenerative diseases**

Rayner, S. L., Morsch, M., Molloy, M. P., Shi, B., Chung, R. & Lee, A., Jul 2019, In: Cellular and Molecular Life Sciences. 76, 13, p. 2499-2510 12 p.

**Proteome profiling of Pseudomonas aeruginosa PAO1 identifies novel responders to copper stress**

Wright, B. W., Kamath, K. S., Krisp, C. & Molloy, M. P., 1 Apr 2019, In: BMC Microbiology. 19, p. 1-13 13 p., 69.

**Pathogenic mutation in the ALS/FTD gene, CCNF, causes elevated Lys48-linked ubiquitylation and defective autophagy.**

Lee, A., Rayner, S. L., Gwee, S. S. L., De Luca, A., Shahheydari, H., Sundaramoorthy, V., Morsch, M., Hogan, A., Don, E., Williams, K., Yerbury, J. J., Blair, I., Atkin, J. D., Molloy, M. P. & Chung, R. S., 8 Feb 2019. 1 p.

**iSwathX: an interactive web-based application for extension of DIA peptide reference libraries**

Noor, Z., Pascovici, D., Mohamedali, A., Molloy, M. P., Baker, M. S. & Ranganathan, S., 1 Feb 2019, In: Bioinformatics. 35, 3, p. 538-539 2 p.

**An integrative "omics" approach, for identification of bona fides PLK1 associated biomarker in esophageal adenocarcinoma**

Bibi, N., Rashid, S., Nicholson, J., Molloy, M., O'Neill, R., Blake, D. & Huppi, T., 2019, In: Current Cancer Drug Targets. 19 , 9, p. 742-755 14 p.
Examining cellular responses to kinase drug inhibition through phosphoproteome mapping of substrates
Bucio-Noble, D., Semaan, C. & Molloy, M. P., 2019, Systems chemical biology: methods and protocols. Ziegler, S. & Waldmann, H. (eds.). New York: Humana Press, p. 141-152 12 p. (Methods in Molecular Biology; vol. 1888).

Practical integration of multi-run iTRAQ data
Pascovici, D., Song, X., Wu, J., Zaw, T. & Molloy, M., 2019, Mass spectrometry of proteins: methods and protocols. Evans, C. A., Wright, P. C. & Noirel, J. (eds.). New York: Humana Press, p. 199-215 17 p. (Methods in Molecular Biology; vol. 1977).

Targeted mass spectrometry of S100 proteins
Martínez-Aguilar, J. & Molloy, M. P., 2019, Calcium-binding proteins of the EF-hand superfamily: from basics to medical applications. Heizmann, C. W. (ed.). New York: Humana Press, p. 663-678 16 p. (Methods in Molecular Biology; vol. 1929).

Vascular targeting of an atypical surface translocated αB-crystallin for the treatment of irradiated brain arteriovenous malformations.
McRobb, L., Subramanian, S., McKay, M., Molloy, M. & Stoodley, M., 2019, (Unpublished).

Proteomics identification of radiation-induced changes of membrane proteins in the rat model of arteriovenous malformation in pursuit of targets for brain AVM molecular therapy
Simonian, M., Shirasaki, D., Lee, V. S., Bervini, D., Grace, M., Loo, R. R. O., Loo, J. A., Molloy, M. P. & Stoodley, M. A., 26 Dec 2018, In: Clinical Proteomics. 15, p. 1-8 8 p., 43.

Pharmacological inhibition of casein kinase 2 enhances the effectiveness of PI3K inhibition in colon cancer cells
Semaan, C., Neilson, K. A., Brown, B. & Molloy, M. P., 1 Nov 2018, In: Anticancer Research. 38, 11, p. 6195-6200 6 p.

Proteomic profile of sex-sorted bull sperm evaluated by SWATH-MS analysis
Scott, C., de Souza, F. F., Aristizabal, V. H. V., Hethrington, L., Krisp, C., Molloy, M., Baker, M. A. & Dell'Aqua, J. A., 1 Nov 2018, In: Animal Reproduction Science. 198, p. 121-128 8 p.

Proteomic phenotyping of metastatic melanoma reveals putative signatures of MEK inhibitor response and prognosis
Krisp, C., Parker, R., Pascovici, D., Hayward, N. K., Wilmott, J. S., Thompson, J. F., Mann, G. J., Long, G. V., Scolyer, R. A. & Molloy, M. P., 17 Aug 2018, In: British Journal of Cancer. 119, 6, p. 713–723 11 p.

Fiber supplements derived from sugarcane stem, wheat dextrin and psyllium husk have different in vitro effects on the human gut microbiota
Gamage, H. K. A. H., Tetu, S. G., Chong, R. W. W., Bucio-Noble, D., Rosewarne, C. P., Kautto, L., Ball, M. S., Molloy, M. P., Packer, N. H. & Paulsen, I. T., 20 Jul 2018, In: Frontiers in Microbiology. 9, p. 1-16 16 p., 1618.

Alternative assembly of respiratory complex II connects energy stress to metabolic checkpoints
Bezawork-Geleta, A., Wen, H., Dong, L., Yan, B., Vider, J., Boukalova, S., Krobova, L., Vanova, K., Zobalova, R., Sobol, M., Hozak, P., Novais, S. M., Caisova, V., Abaffy, P., Naraine, R., Pang, Y., Zaw, T., Zhang, P., Sindelka, R., Kubista, M., & 7 othersZury, S., Molloy, M. P., Berridge, M. V., Pacak, K., Rohlena, J., Park, S. & Neuzil, J., 7 Jun 2018, In: Nature Communications. 9, p. 1-17 17 p., 2221.

Quantitation of the anticancer drug abiraterone and its metabolite Δ(4)-abiraterone in human plasma using high-resolution mass spectrometry
Bhatnagar, A., McKay, M. J., Crumbaker, M., Ahire, K., Karuso, P., Gurney, H. & Molloy, M. P., 30 May 2018, In: Journal of Pharmaceutical and Biomedical Analysis. 154, p. 66-74 9 p.

Multi-laboratory analysis of the variability of shipped samples for proteomics following non-cooled international transport
Steffen, P., Krisp, C., Yi, W., Yang, P., Molloy, M. P. & Schlüter, H., 1 May 2018, In: Analytical Biochemistry. 548, p. 60-65 6 p.
Polyphenol extracts from dried sugarcane inhibit inflammatory mediators in an in vitro colon cancer model
Bucio-Noble, D., Kautto, L., Krisp, C., Ball, M. S. & Molloy, M. P., 15 Apr 2018, In: Journal of Proteomics. 177, p. 1-10 10 p.

Development of a data independent acquisition mass spectrometry workflow to enable glycopeptide analysis without predefined glycan compositional knowledge
Lin, C.-H., Krisp, C., Packer, N. H. & Molloy, M. P., 10 Feb 2018, In: Journal of Proteomics. 172, p. 68-75 8 p.

Pathogenic mutation in the ALS/FTD gene, CCNF, causes elevated Lys48-linked ubiquitylation and defective autophagy
Lee, A., Rayner, S. L., Gwee, S. S. L., De Luca, A., Shahheydari, H., Sundaramoorthy, V., Ragagnin, A., Morsch, M., Radford, R., Galper, J., Freckleton, S., Shi, B., Walker, A. K., Don, E. K., Cole, N. J., Yang, S., Williams, K. L., Yerbury, J. J., Blair, I. P., Atkin, J. D., & 2 others Molloy, M. P. & Chung, R. S., Jan 2018, In: Cellular and Molecular Life Sciences. 75, 2, p. 335–354 20 p.

Effect of processing on Mungbean (Vigna radiata) flour nutritional properties and protein composition
Skylas, D. J., Molloy, M. P., Willows, R. D., Salman, H., Blanchard, C. L. & Quail, K. J., 2018, In: Journal of Agricultural Science. 10, 11, p. 16-28 13 p.

Mutations to a new ALS/FTD gene, CCNF, uncovers new mechanisms of Lys48-ubiquitylation regulation by the Skp-Cul-F-Box(Cyclin F) (SCF(CyclinF)) E3 ligase complex
Lee, A., Rayner, S. L., Gwee, S. S. L., Sundaramoorthy, V., Morsch, M., Radford, R., Yang, S., Williams, K. L., Hogan, A., Don, E. K., Cole, N. J., Blair, I. P., Atkin, J. D., Molloy, M. P. & Chung, R. S., 20 Nov 2017, p. 40. 1 p.

Improving protein detection confidence using SWATH-Mass spectrometry with large peptide reference libraries
Wu, J. X., Pascovici, D., Ignjatovic, V., Song, X., Krisp, C. & Molloy, M. P., 9 Oct 2017, In: Proteomics. 17, 19, p. 1-5 5 p., 1700174.

Pseudomonas aeruginosa proteome under hypoxic stress conditions mimicking the cystic fibrosis lung
Kamath, K. S., Krisp, C., Chick, J., Pascoevici, D., Gygi, S. P. & Molloy, M. P., 6 Oct 2017, In: Journal of Proteome Research. 16, 10, p. 3917-3928 12 p.

Age-related neurodegenerative disease associated pathways identified in retinal and vitreous proteome from human glaucoma eyes
Mirzaei, M., Gupta, V. B., Chick, J. M., Greco, T. M., Wu, Y., Chitranshi, N., Wall, R. V., Hone, E., Deng, L., Dheer, Y., Abbasi, M., Rezaei, M., Braidy, N., You, Y., Salekdeh, G. H., Haynes, P. A., Molloy, M. P., Martins, R., Cristea, I. M., Gygi, S. P., & 2 others Graham, S. L. & Gupta, V. K., 4 Oct 2017, In: Scientific Reports. 7, 1, p. 1-16 16 p., 12685.

Meet our editorial board member
Molloy, M. P., 1 Sep 2017, In: Current Proteomics. 14, 3, p. 165 1 p.

Plasma biomarker proteins for detection of human growth hormone administration in athletes
Tan, S.-H., Lee, A., Pascoevici, D., Care, N., Birzniece, V., Ho, K., Molloy, M. P. & Khan, A., 30 Aug 2017, In: Scientific Reports. 7, 1, p. 1-12 12 p., 10039.

Multi-laboratory assessment of reproducibility, qualitative and quantitative performance of SWATH-mass spectrometry
Collins, B. C., Hunter, C. L., Liu, Y., Schilling, B., Rosenberger, G., Bader, S. L., Chan, D. W., Gibson, B. W., Gingras, A. C., Held, J. M., Hirayama-Kurogi, M., Hou, G., Krisp, C., Larsen, B., Lin, L., Liu, S., Molloy, M. P., Moritz, R. L., Ohtsuki, S., Schlappbach, R., & 5 others Selevsek, N., Thomas, S. N., Tzeng, S. C., Zhang, H. & Aebersold, R., 21 Aug 2017, In: Nature Communications. 8, p. 1-12 12 p., 291.

Expression of ALS/FTD-linked mutant CCNF in zebrafish leads to increased cell death in the spinal cord and an aberrant motor phenotype
Hogan, A. L., Don, E. K., Rayner, S. L., Lee, A., Laird, A. S., Watchon, M., Winnick, C., Tarr, I. S., Morsch, M., Fifita, J. A., Gwee, S. S. L., Formella, I., Hortle, E., Yuan, K. C., Molloy, M. P., Williams, K. L., Nicholson, G. A., Chung, R. S., Blair, I. P. & Cole, N. J., 15 Jul 2017, In: Human Molecular Genetics. 26, 14, p. 2616-2626 11 p.
Quantitative age-specific variability of plasma proteins in healthy neonates, children and adults
Bjelosevic, S., Pascovici, D., Ping, H., Karlaftis, V., Zaw, T., Song, X., Molloy, M. P., Monagle, P. & Ignjatovic, V., 1 May 2017, In: Molecular and Cellular Proteomics. 16, 5, p. 924-935 12 p.

Ionizing radiation reduces ADAM10 expression in brain microvascular endothelial cells undergoing stress-induced senescence
McRobb, L. S., McKay, M. J., Gamble, J. R., Grace, M., Moutrie, V., Santos, E. D., Lee, V. S., Zhao, Z., Molloy, M. P. & Stoodley, M. A., 17 Apr 2017, In: Aging. 9, 4, p. 1248-1268 21 p.

Unraveling the role of protein kinase CK2 in metal toxicity using gene deletion mutants
Johnson, A. J., Zaman, M. S., Veljanoski, F., Phrakaysone, A. A., Li, S., O'Doherty, P. J., Petersingham, G., Perrone, G. G., Molloy, M. P. & Wu, M. J., 22 Mar 2017, In: Metallomics. 9, 3, p. 301-308 8 p.

Casein kinase II phosphorylation of cyclin F at serine 621 regulates the Lys48-ubiquitylation E3 ligase activity of the SCF (Cyclin F) complex
Lee, A., Rayner, S. L., De Luca, A., Gwee, S. S. L., Morsch, M., Sundaramoorthy, V., Shahheydari, H., Ragagnin, A., Shi, B., Yang, S., Williams, K. L., Don, E. K., Walker, A. K., Zhang, K. Y., Yerbury, J. J., Cole, N. J., Atkin, J. D., Blair, I. P., Molloy, M. P. & Chung, R. S., 2017, In: Open Biology. 7, 10, p. 1-11 11 p., 170058.

Characterisation of protein isolates prepared from processed mungbean (Vigna radiata) flours
Skylas, D. J., Molloy, M. P., Willows, R. D., Blanchard, C. L. & Quail, K. J., 2017, In: Journal of Agricultural Science. 9, 12, p. 1-10 10 p.

Identification of protein targets in cerebral endothelial cells for brain arteriovenous malformation (AVMs) molecular therapies
Simonian, M., Loo, R. R. O., Rannulu, N., Loo, J. A., Molloy, M. P. & Stoodley, M. A., 2017, In: Clinical Proteomics. 14, p. 1-12 12 p., 17.

Organic macromolecules in shells of Arctica islandica: comparison with nacroprismatic bivalve shells
Agbaje, O. B. A., Thomas, D. E., McInerney, B., Molloy, M. P. & Jacob, D. E., 2017, In: Marine Biology. 164, 11, p. 1-13 13 p., 208.

Radiosurgery alters the endothelial surface proteome: externalized intracellular molecules as potential vascular targets in irradiated brain arteriovenous malformations
McRobb, L. S., Lee, V. S., Simonian, M., Zhao, Z., Thomas, S. G., Wiedmann, M., Amal Raj, J. V., Grace, M., Moutrie, V., McKay, M. J., Molloy, M. P. & Stoodley, M. A., 2017, In: Radiation Research. 187, 1, p. 66-78 13 p.

SWATH mass spectrometry for proteomics of non-depleted plasma
Krisp, C. & Molloy, M. P., 2017, Serum/plasma proteomics: methods and protocols. Greening, D. W. & Simpson, R. J. (eds.). 2nd ed. New York: Humana Press, p. 373-383 11 p. (Methods in molecular biology; vol. 1619).

TMT one-stop shop: from reliable sample preparation to computational analysis platform
Mirzaei, M., Pascovici, D., Wu, J. X., Chick, J., Wu, Y., Cooke, B., Haynes, P. & Molloy, M. P., 2017, Proteome Bioinformatics: Methods in Molecular Biology. Keerthikumar, S. & Mathivanan, S. (eds.). New York: Humana Press Inc., Vol. 1549. p. 45-66 22 p. (Methods in Molecular Biology; vol. 1549).

Mutations in a new ALS/FTD gene, CCNF, uncovers new mechanisms of Lys48-ubiquitylation regulation by the Skp-Cul-F-Box(Cyclin F) (SCF(CyclinF)) E3 ligase complex
Lee, A., Rayner, S., Gwee, S., Sundaramoorthy, V., Morsch, M., Radford, R., Yang, S., Williams, K., Hogan, A., Don, E., Cole, N., Blair, I., Atkin, J., Molloy, M. & Chung, R., 7 Dec 2016, In: Amyotrophic Lateral Sclerosis and Frontotemporal Degeneration. 17, Supplement 1, p. 163 1 p., P130.

Characterisation of the immune compounds in koala milk using a combined transcriptomic and proteomic approach
Morris, K. M., O'Meally, D., Zaw, T., Song, X., Gillett, A., Molloy, M. P., Polkinghorne, A. & Belov, K., 7 Oct 2016, In: Scientific Reports. 6, p. 1-14 14 p., 35011.
Exhaled breath condensate for lung cancer protein analysis: A review of methods and biomarkers
Hayes, S. A., Haefliger, S., Harris, B., Paviakis, N., Clarke, S. J., Molloy, M. P. & Howell, V. M., Sep 2016, In: Journal of Breath Research. 10, 3, p. 1-26 26 p., 034001.

Changes in the in vitro activity of platinum drugs when administered in two aliquots
Al-Eisawi, Z., Beale, P., Chan, C., Yu, J. Q., Proschogo, N., Molloy, M. & Huq, F., 26 Aug 2016, In: BMC Cancer. 16, p. 1-25 25 p., 688.

Analytical performance of nano-LC-SRM using nondepleted human plasma over an 18-month period
Song, X., Amirkhani, A., Wu, J. X., Pascovici, D., Zaw, T., Xavier, D., Clarke, S. J. & Molloy, M. P., 1 Aug 2016, In: Proteomics. 16, 15-16, p. 2118-2127 10 p.

Pseudomonas aeruginosa cell membrane protein expression from phenotypically diverse cystic fibrosis isolates demonstrates host-specific adaptations
Kamath, K. S., Pascovici, D., Penesyan, A., Goel, A., Venkatakrishnan, V., Paulsen, I. T., Packer, N. H. & Molloy, M. P., 1 Jul 2016, In: Journal of Proteome Research. 15, 7, p. 2152-2163 12 p.

SWATH mass spectrometry performance using extended peptide MS/MS assay libraries
Wu, J. X., Song, X., Pascovici, D., Zaw, T., Care, N., Krisp, C. & Molloy, M. P., 1 Jul 2016, In: Molecular and Cellular Proteomics. 15, 7, p. 2501-2514 14 p.

Protein mapping of NSCLC cell lines: defining mechanisms of acquired erlotinib resistance
Hayes, S. A., Krisp, C., Hudson, A. L., Harvie, R., Hasovits, C., Clarke, S., Molloy, M. P. & Howell, V. M., Jul 2016, In: Cancer Research. 76, 14 Supplement, 3886.

CCNF mutations in amyotrophic lateral sclerosis and frontotemporal dementia
Williams, K. L., Topp, S., Yang, S., Smith, B., Fifita, J. A., Warraich, S. T., Zhang, K. Y., Farrawell, N., Vance, C., Hu, X., Chesi, A., Leblond, C. S., Lee, A., Rayner, S. L., Sundaramoorthy, V., Dobson-Stone, C., Molloy, M. P., Van Blitterswijk, M., Dickson, D. W., Petersen, R. C., & 48 othersGraff-Radford, N. R., Boeve, B. F., Murray, M. E., Pottier, C., Don, E., Winnick, C., McCann, E. P., Hogan, A., Daoud, H., Levert, A., Dion, P. A., Mitsui, J., Ishiura, H., Takahashi, Y., Goto, J., Kost, J., Geller, C., Gkazi, A. S., Miller, J., Stockton, J., Brooks, W. S., Boundy, K., Polak, M., Muñoz-Bianco, J. L., Esteban-Pérez, J., Rábano, A., Hardiman, O., Morrison, K. E., Ticozzi, N., Silani, V., De Belleroce, J., Glass, J. D., Kwok, J. B. J., Guillemin, G. J., Chung, R. S., Tsuji, S., Brown, R. H., Garcia-Redondo, A., Rademakers, R., Landers, J. E., Gitler, A. D., Rouleau, G. A., Cole, N. J., Yerbury, J. J., Atkin, J. D., Shaw, C. E., Nicholson, G. A. & Blair, I. P., 15 Apr 2016, In: Nature Communications. 7, p. 1-8 p., 11253.

Proteomics of thyroid tumours provides new insights into their molecular composition and changes associated with malignancy
Martínez-Aguilar, J., Clifton-Bligh, R. & Molloy, M. P., 30 Mar 2016, In: Scientific Reports. 6, p. 1-12 12 p., 23660.

A proteomics-based approach identifies secreted protein acidic and rich in cysteine as a prognostic biomarker in malignant pleural mesothelioma
Kao, S. C., Kirchner, M. B., Cooper, W. A., Tran, T., Burgers, S., Wright, C., Korse, T., Van Den Broek, D., Edelman, J., Valleys, M., McCaughan, B., Paviakis, N., Clarke, S., Molloy, M. P., Van Zandwijk, N. & Reid, G., 1 Mar 2016, In: British Journal of Cancer. 114, 5, p. 524-531 8 p.

Characterization of a beta-catenin nuclear localization defect in MCF-7 breast cancer cells
Jamieson, C., Mills, K. M., Lui, C., Semaan, C., Molloy, M. P., Sharma, M., Forwood, J. K. & Henderson, B. R., 15 Feb 2016, In: Experimental Cell Research. 341, 2, p. 196-206 11 p.

Advanced applications for identification and quantification of the phosphoproteome
Parker, R. & Molloy, M. P., 2016, Advanced LC-MS applications for proteomics. Pennington, S. R. (ed.). London: Future Science Group, p. 1-17 17 p.
Priming adipose-derived mesenchymal stem cells with hyaluronan alters growth kinetics and increases attachment to articular cartilage
Succar, P., Medynskyj, M., Breen, E. J., Batterham, T., Molloy, M. P. & Herbert, B. R., 2016, In: Stem Cells International. 2016, p. 1-13 13 p., 9364213.

Fetuin B Is a Secreted Hepatocyte Factor Linking Steatosis to Impaired Glucose Metabolism
Meex, R. C., Hoy, A. J., Morris, A., Brown, R. D., Lo, J. C. Y., Burke, M., Goode, R. J. A., Kingwell, B. A., Kraakman, M. J., Febbraio, M. A., Greve, J. W., Rensen, S. S., Molloy, M. P., Lancaster, G. I., Bruce, C. R. & Watt, M. J., 1 Dec 2015, In: Cell Metabolism. 22, 6, p. 1078-1089 12 p.

Reporting in studies of protein biomarkers of prognosis in colorectal cancer in relation to the REMARK guidelines
Jankova, L., Dent, O. F., Molloy, M. P., Chan, C., Chapuis, P. H., Howell, V. M. & Clarke, S. J., 1 Dec 2015, In: Proteomics - Clinical Applications. 9, 11-12, p. 1078-1086 9 p.

Genetically and phenotypically distinct Pseudomonas aeruginosa cystic fibrosis isolates share a core proteomic signature
Penesyan, A., Kumar, S. S., Kamath, K., Shathili, A. M., Venkatakrishnan, V., Krisp, C., Packer, N. H., Molloy, M. P. & Paulsen, I. T., 2 Oct 2015, In: PLoS ONE. 10, 10, p. 1-26 26 p., e0138527.

Inter-laboratory evaluation of instrument platforms and experimental workflows for quantitative accuracy and reproducibility assessment
Percy, A. J., Tamura-Wells, J., Albar, J. P., Aloria, K., Amirkhani, A., Araujo, G. D. T., Arizmendi, J. M., Blanco, F. J., Canals, F., Cho, J. Y., Colonó-Calls, N., Corrales, F. J., Domont, G., Espadas, G., Fernandez-Puente, P., Gil, C., Haynes, P. A., Hernáez, M. L., Kim, J. Y., Kopylov, A., & 16 othersMarcilla, M., McKay, M. J., Mirzaei, M., Molloy, M. P., Ohlund, L. B., Paik, Y. K., Paradelo, A., Raferty, M., Sabidó, E., Sleno, L., Wilffert, D., Wolters, J. C., Yoo, J. S., Zgoda, V., Parker, C. E. & Borchers, C. H., 1 Sep 2015, In: EuPA Open Proteomics. 8, p. 6-15 10 p.

Identification of secreted factors linking hepatic steatosis to insulin resistance
Meex, R. C. R., Hoy, A. J., Morris, A., Brown, R. D., Burke, M., Goode, R., Rensen, S. S., Kingwell, B. A., Lancaster, G. I., Kraakman, M., Febbraio, M. A., Meikle, P. J., Molloy, M. P., Bruce, C. R. & Watt, M. J., Sep 2015, In: Diabetologia. 58, Suppl. 1, p. S281 1 p.

Targeted delivery of a synthetic mircoma-based mimic to treat thoracic cancers
Reid, G., Cheng, Y. Y., Sarun, K., Williams, M., Kirschner, M. B., Despotovski, A., Mugridge, N., Weiss, J., Brahmbhatt, H., Macdiarmid, J., Molloy, M., Lin, R. & Van Zandwijk, N., Sep 2015, In: Journal of Thoracic Oncology. 10, 9, p. S426-S426 1 p.

Online peptide fractionation using a multiphasic microfluidic liquid chromatography chip improves reproducibility and detection limits for quantitation in discovery and targeted proteomics
Krisp, C., Yang, H., Van Soest, R. & Molloy, M. P., 1 Jun 2015, In: Molecular and Cellular Proteomics. 14, 6, p. 1708-1719 12 p.

The mannose-6-phosphate analogue, PXS64, inhibits fibrosis via TGF-β1 pathway in human lung fibroblasts
Schilter, H., Canternir-Stone, C. Z., Leksa, V., Ohradanova-Repic, A., Findlay, A. D., Deodhar, M., Stockinger, H., Song, X., Molloy, M., Marsh, C. B. & Jarolimek, W., 1 Jun 2015, In: Immunology Letters. 165, 2, p. 90-101 12 p.

Cytokine profiling of docetaxel-resistant castration-resistant prostate cancer
Mahon, K. L., Lin, H. M., Castillo, L., Lee, B. Y., Lee-Ng, M., Chatfield, M. D., Chiam, K., Breit, S. N., Brown, D. A., Molloy, M. P., Marx, G. M., Pavlakis, N., Boyer, M. J., Stockler, M. R., Daly, R. J., Henshall, S. M. & Horvath, L. G., 14 Apr 2015, In: British Journal of Cancer. 112, 8, p. 1340-1348 9 p.

A multiplexed, targeted mass spectrometry assay of the S100 protein family uncovers the isoform-specific expression in thyroid tumours
Martínez-Aguilar, J., Clifton-Bligh, R. & Molloy, M. P., 29 Mar 2015, In: BMC Cancer. 15, p. 1-14 14 p., 199.

Combining protein ratio p -values as a pragmatic approach to the analysis of multinun iTRAQ experiments
Pascovici, D., Song, X., Solomon, P. S., Winterberg, B., Mirzaei, M., Goodchild, A., Stanley, W. C., Liu, J. & Molloy, M. P., 6 Feb 2015, In: Journal of Proteome Research. 14, 2, p. 738-746 9 p.
Multidimensional fractionation is a requirement for quantitation of golgi-resident glycosylation enzymes from cultured human cells
Lin, C. H., Chik, J. H. L., Packer, N. H. & Molloy, M. P., 6 Feb 2015, In: Journal of Proteome Research. 14, 2, p. 747-755 9 p.

Proteomics of hosts and pathogens in cystic fibrosis
Kamath, K. S., Kumar, S. S., Kaur, J., Venkatakrishnan, V., Paulsen, I. T., Nevalainen, H. & Molloy, M. P., 1 Feb 2015, In: Proteomics - Clinical Applications. 9, 1-2, p. 134-146 13 p.

Phosphoproteomic analysis of cell-based resistance to BRAF inhibitor therapy in melanoma
Parker, R., Vella, L. J., Xavier, D., Amirkhani, A., Parker, J., Cebon, J. & Molloy, M. P., 2015, In: Frontiers in Oncology. 5, p. 1-13 13 p., 95.

Wherefore art thou biomarker(s)? opportunities for proteomics
Molloy, M., Nov 2014, In: Asia-Pacific journal of clinical oncology : special Issue : Sydney cancer conference. 10, S7, p. 11-11 1 p.

Comprehensive proteomic profiling of bevacizumab-resistant glioblastoma multiforme
Kaufman, K. L., Ly, L., McKay, M., Mallawaaratchy, D. M., Mactier, S., Crossett, B., Molloy, M., Buckland, M. E., McDonald, K. L. & Christopherson, R. I., Sep 2014, In: Neuro-Oncology. 16, Supplement 2, p. 1 1 p., ii98.

Comprehensive glycomics comparison between colon cancer cell cultures and tumours: Implications for biomarker studies
Chik, J. H. L., Zhou, J., Moh, E. S. X., Christopherson, R., Clarke, S. J., Molloy, M. P. & Packer, N. H., 28 Aug 2014, In: Journal of Proteomics. 108, p. 146-162 17 p.

The necrotrophic effector protein SnTox3 re-programs metabolism and elicits a strong defence response in susceptible wheat leaves
Winterberg, B., Du Fall, L. A., Song, X., Pascovici, D., Care, N., Molloy, M., Ohms, S. & Solomon, P. S., 15 Aug 2014, In: PLoS ONE. 9, 8, p. 1-17 17 p., e103326.

SecDF as part of the sec-translocase facilitates efficient secretion of Bacillus cereus toxins and cell wall-associated proteins
Vörös, A., Simm, R., Siamti, L., McKay, M. J., Hegna, I. K., Nielsen-LeRoux, C., Hassan, K. A., Paulsen, I. T., Lereclus, D., Okstad, O. A., Molloy, M. P. & Kolstø, A. B., 1 Aug 2014, In: PLoS ONE. 9, 8, p. 1-17 17 p., e103326.

Phosphoproteomics of MAPK inhibition in BRAF-mutated cells and a role for the lethal synergism of dual BRAF and CK2 inhibition
Parker, R., Clifton-Bligh, R. & Molloy, M. P., Jul 2014, In: Molecular Cancer Therapeutics. 13, 7, p. 1894-1906 13 p.

Prognostic significance of circulating secreted protein acidic and rich in cysteine (SPARC) in malignant pleural mesothelioma (MPM)
Kao, S. C. H., Kirschner, M. B., Molloy, M. P., Clarke, S. J., Burgers, S. A., Korse, C. M., Van Den Broek, D., Van Zandwijk, N. & Reid, G., 20 May 2014, In: Journal of Clinical Oncology. 32, 15_suppl, p. 7580-7580 1 p.

Stoichiometry of Saccharomyces cerevisiae lysine methylation: Insights into non-histone protein lysine methyltransferase activity
Hart-Smith, G., Chia, S. Z., Low, J. K. K., McKay, M. J., Molloy, M. P. & Wilkins, M. R., 7 Mar 2014, In: Journal of Proteome Research. 13, 3, p. 1744-1756 13 p.

From mice to men: GEMMs as trial patients for new NSCLC therapies
Hayes, S. A., Hudson, A. L., Clarke, S. J., Molloy, M. P. & Howell, V. M., Mar 2014, In: Seminars in Cell and Developmental Biology. 27, p. 118-127 10 p.
Secreted protein acidic and rich in cysteine (SPARC) in malignant pleural mesothelioma (MPM)
Kao, S. C., Kirschner, M. B., Cooper, W., Wright, C., Burgers, S. A., Gray, S., Korse, C. M., van den Broek, D., Linton, A., Clarke, S. J., Molloy, M. P., Van Zandwijk, N. & Reid, G., 2014, In: Asia-Pacific Journal of Clinical Oncology. 10, S6, p. 49 1 p.

Coverage and consistency: Bioinformatics aspects of the analysis of multirun iTRAQ experiments with wheat leaves
Pascovici, D., Gardiner, D. M., Song, X., Breen, E., Solomon, P. S., Keightley, T. & Molloy, M. P., 1 Nov 2013, In: Journal of Proteome Research. 12, 11, p. 4870-4881 12 p.

Detecting alterations of golgi resident glycosylation enzymes via quantitative proteomics: analysis of enriched golgi membranes
Lin, C-H., Chik, J., Molloy, M. P. & Packer, N. H., Nov 2013, In: Glycobiology. 23, 11, p. 1371-1371 1 p.

Novel plasma proteins associated with prognosis in malignant pleural mesothelioma
Kao, S. C., Kirschner, M. B., Amirkhani, A., Pascovici, D., Song, X., Harvie, R., Pavakis, N., Clarke, S., Molloy, M. P., Van Zandwijk, N. & Reid, G., Nov 2013, In: Journal of Thoracic Oncology. 8, 11S2, p. S787-S787 1 p.

Proteome analysis reveals antiangiogenic environments in chronic wounds of diabetes mellitus type 2 patients
Krisp, C., Jacobsen, F., Mckay, M. J., Molloy, M. P., Steinraesser, L. & Wolters, D. A., Sep 2013, In: Proteomics. 13, 17, p. 2670-2681 12 p.

Label-free selected reaction monitoring enables multiplexed quantitation of S100 protein isoforms in cancer cells
Martínez-Aguilar, J. & Molloy, M. P., 2 Aug 2013, In: Journal of Proteome Research. 12, 8, p. 3679-3688 10 p.

The role of macrophages in Docetaxel (DTX) resistance in castrate resistant prostate cancer (CRPC)
Mahon, K. L., Chatfield, M. D., Breit, S. N., Brown, D., Molloy, M., Marx, G., Pavakis, N., Boyer, M., Stockler, M. R. & Horvath, L. G., Aug 2013, In: BJU international. 112, S1, p. 30-31 2 p.

Detection and quantification of polypeptides using mass spectrometry
Ashman, K., McKay, M., Sherman, J. & Molloy, M., 16 Jul 2013, (Submitted) IPC No. G01N 33/68, H01J 49/00, H01J 49/26, Patent No. US20140156206, 18 Dec 2006, Priority date 18 Dec 2006, Priority No. AU2006907017

The role of macrophages in Docetaxel (DTX) resistance in castrate-resistant prostate cancer (CRPC).
Horvath, L. G., Chatfield, M. D., Lee-Ng, M., Lin, H-M., Castillo, L., Breit, S. N., Brown, D. A., Molloy, M. P., Marx, G. M., Pavakis, N., Boyer, M. J., Stockier, M. R., Wykes, R., Henshall, S. M. & Mahon, K. L., 20 May 2013, In: Journal of Clinical Oncology. 31, 15_suppl, p. 1-1 1 p.

Tandem ion exchange fractionation of chicken egg white reveals the presence of proliferative bioactivity
Lee, A., Molloy, M. P., Baker, M. S. & Kapur, A., 1 May 2013, In: Journal of Agricultural and Food Chemistry. 61, 17, p. 4079-4088 10 p.

Two-stepping to increase peptide spectra matches in large databases
Molloy, M. P., Apr 2013, In: Proteomics. 13, 8, p. 1229-1230 2 p.

Quantitative mass spectrometry for colorectal cancer proteomics
Martínez-Aguilar, J., Chik, J., Nicholson, J., Semaan, C., Mckay, M. J. & Molloy, M. P., Jan 2013, In: Proteomics - Clinical Applications. 7, 1-2, p. 42-54 13 p.

A Protein annotation framework empowered with semantic reasoning
Wu, J. X., Breen, E. J., Song, X., Cooke, B. & Molloy, M. P., 2013, In: CEUR Workshop Proceedings. 1035, p. 185-188 4 p.

Remarkable temporal stability of high-abundance human plasma proteins assessed by targeted mass spectrometry
Randall, S. A., Mckay, M. J., Pascovici, D., Mahon, K., Horvath, L., Clarke, S. J. & Molloy, M. P., Dec 2012, In: Proteomics - Clinical Applications. 6, 11-12, p. 626-634 9 p.
An iTRAQ Proteomics Screen Reveals the Effects of the MDM2 Binding Ligand Nutlin-3 on Cellular Proteostasis
Nicholson, J., Neelagandan, K., Huart, A. S., Ball, K., Molloy, M. P. & Hupp, T., 2 Nov 2012, In: Journal of Proteome Research. 11, 11, p. 5464-5478 15 p.

Overexpression of protein S100A4 is independently associated with overall survival in stage C colonic cancer but only in cytoplasm at the advancing tumour front
Kho, P. S. S., Jankova, L., Fung, C. L. S., Chan, C., Clarke, C., Lin, B. P. C., Robertson, G., Molloy, M., Chapuis, P. H., Bokey, E. L., Dent, O. F. & Clarke, S., Nov 2012, In: International Journal of Colorectal Disease. 27, 11, p. 1409-1417 9 p.

Glutathione S-transferase Pi expression predicts response to adjuvant chemotherapy for stage C colon cancer: a matched historical control study
Jankova, L., Robertson, G., Chan, C., Tan, K. L., Kohonen-Corish, M., Fung, C. L. S., Clarke, C., Lin, B. P. C., Molloy, M., Chapuis, P. H., Bokey, L., Dent, O. F. & Clarke, S. J., 28 May 2012, In: BMC Cancer. 12, p. 1-9 9 p., 196.

Why complexity and entropy matter: Information, posttranslational modifications, and assay fidelity
Sherman, J., Molloy, M. P. & Burlingame, A. L., Apr 2012, In: Proteomics. 12, 8, p. 1147-1150 4 p.

Multidimensional protein identification technology-selected reaction monitoring improving detection and quantification for protein biomarker studies
Krisp, C., McKay, M. J., Wolters, D. A. & Molloy, M. P., 7 Feb 2012, In: Analytical Chemistry. 84, 3, p. 1592-1600 9 p.

Mutated in colorectal cancer protein modulates the NFκB pathway
Sigglekow, N. D., Pangon, L., Brummer, T., Molloy, M., Hawkins, N. J., Ward, R. L., Musgrove, E. A. & Kohonen-Corish, M. R. J., Jan 2012, In: Anticancer Research. 32, 1, p. 73-79 7 p.

Towards clinical applications of selected reaction monitoring for plasma protein biomarker studies
Krisp, C., Randall, S. A., McKay, M. J. & Molloy, M. P., Jan 2012, In: Proteomics - Clinical Applications. 6, 1-2, p. 42-59 18 p.

In vitro and in vivo biotinylation of endothelial cell surface proteins in the pursuit of targets for molecular therapies for brain AVMs
Simonian, M., Molloy, M. P. & Stoodley, M. A., 2012, In: Metabolomics : open access. 2012, S1, p. 007-1-007-4 7 p.

Clinicopathological correlates and prognostic significance of glutathione S-transferase Pi expression in 468 patients after potentially curative resection of node-positive colorectal cancer
Tan, K. L., Jankova, L., Chan, C., Fung, C. L-S., Clarke, C., Lin, B. P. C., Robertson, G., Molloy, M., Chapuis, P. H., Bokey, L., Dent, O. F. & Clarke, S. J., Dec 2011, In: Histopathology. 59, 6, p. 1057-1070 14 p.

Proteomic comparison of colorectal tumours and non-neoplastic mucosa from paired patient samples using iTRAQ mass spectrometry
Jankova, L., Chan, C., Fung, C. L. S., Song, X., Kwun, S. Y., Cowley, M. J., Kaplan, W., Dent, O. F., Bokey, E. L., Chapuis, P. H., Baker, M. S., Robertson, G. R., Clarke, S. J. & Molloy, M. P., 1 Nov 2011, In: Molecular BioSystems. 7, 11 , p. 2997-3005 9 p.

Tumour-derived Cctokines as a key determinant of drug clearance in cancer
Robertson, G. R., Painter, A., Taylor, R., Jankova, L., Tsoli, M., Perera, V., Burg, D. W., Molloy, M., Clarke, S. J. & McLachlan, A. J., Nov 2011, In: Drug Metabolism Reviews. 43, S2, p. 12-12 1 p.

Quantitative phosphoproteomics of transforming growth factor-β signaling in colon cancer cells
Ali, N. A. & Molloy, M. P., Aug 2011, In: Proteomics. 11, 16, p. 3390-3401 12 p.

Quantitative chemical proteomics in small-scale culture of phorbol ester stimulated basal breast cancer cells
Dolai, S., Xu, Q., Liu, F. & Molloy, M. P., 13 Jul 2011, In: Proteomics. 11, 13, p. 2683-2692 10 p.
Polyomic profiling reveals significant hepatic metabolic alterations in glucagon-receptor (GCGR) knockout mice: Implications on anti-glucagon therapies for diabetes
Yang, J., MacDougall, M. L., McDowell, M. T., Xi, L., Wei, R., Zavodoski, W. J., Molloy, M. P., Baker, J. D., Kuhn, M., Cabrera, O. & Treadway, J. L., 1 Jun 2011, In: BMC Genomics. 12, p. 1-14 14 p., 181.

Cytokines' profiles to predict chemotherapy outcome in castration-resistant prostate cancer (CRPC)
Mahon, K. L., Chatfield, M. D., Lee-Ng, M., Breit, S. N., Brown, D. A., Molloy, M. P., Marx, G. M., Pavlakis, G. N., Boyer, M. J., Stockler, M. R., Wykes, R. J., Henshall, S. M., Sutherland, R. L. & Horvath, L., 20 May 2011, In: Journal of Clinical Oncology. 29, 15, p. S22 1 p.

Classification of cancer patients using pathway analysis and network clustering
Fung, D. C. Y., Lo, A., Jankova, L., Clarke, S. J., Molloy, M., Robertson, G. R. & Wilkins, M. R., 2011, Network Biology: Methods and Applications. Cagney, G. & Emili, A. (eds.). New York: Humana Press, Vol. 781. p. 311-336 26 p. (Methods in Molecular Biology; vol. 781).

GSTPi expression predicts benefit from 5FU-based chemotherapy after resection of stage C colon cancer
Jankova, L., Dent, O. F., Chan, C., Tan, K. L., Fung, C. L. S., Molloy, M., Chapuis, P. H., Bokey, L., Robertson, G. & Clarke, S. J., 2011, In: International Journal of Molecular Medicine. 28, p. S29-S29 1 p.

Detection and quantification of polypeptides using mass spectrometry
Ashman, K., McKay, M., Molloy, M. & Sherman, J., 25 Nov 2010, IPC No. H01J 49/26 A I, G01N 31/00, Patent No. US20100299081, Priority date 18 Dec 2007, Priority No. US20070922690

Proteomics of Smad4 regulated transforming growth factor-beta signalling in colon cancer cells
Ali, N. A., McKay, M. J. & Molloy, M. P., Nov 2010, In: Molecular BioSystems. 6, 11, p. 2332-2338 7 p.

Evaluation of blood collection tubes using selected reaction monitoring MS: implications for proteomic biomarker studies
Randall, S. A., McKay, M. J., Baker, M. S. & Molloy, M. P., May 2010, In: Proteomics. 10, 10, p. 2050-2056 7 p.

Clinicopathological correlates and prognostic significance of maspin expression in 450 patients after potentially curative resection of node-positive colon cancer
Fung, C. L. S., Chan, C., Jankova, L., Dent, O. F., Robertson, G., Molloy, M., Bokey, L., Chapuis, P. H., Lin, B. P. C. & Clarke, S. J., Feb 2010, In: Histopathology. 56, 3, p. 319-330 12 p.

High-abundance protein depletion: Comparison of methods for human plasma biomarker discovery
Polaskova, V., Kapur, A., Khan, A., Molloy, M. P. & Baker, M. S., Feb 2010, In: Electrophoresis. 31, 3, p. 471-482 12 p.

Identification of distinctive protein expression patterns in colorectal adenoma
Lam, F. F., Jankova, L., Dent, O. F., Molloy, M. P., Kwun, S. Y., Clarke, C., Chapuis, P., Robertson, G., Beale, P., Clarke, S., Bokey, E. L. & Chan, C., Jan 2010, In: Proteomics - Clinical Applications. 4, 1, p. 60-70 11 p.

Identification of candidate biomarkers of therapeutic response to docetaxel by proteomic profiling
Zhao, L., Lee, B. Y., Brown, D. A., Molloy, M. P., Marx, G. M., Pavlakis, N., Boyer, M. J., Stockler, M. R., Kaplan, W., Breit, S. N., Sutherland, R. L., Henshall, S. M. & Horvath, L. G., 1 Oct 2009, In: Cancer Research. 69, 19, p. 7696-7703 8 p.

Plasma biomarkers for early prediction of chemotherapy response and toxicity in colorectal cancer
Chua, W., Randall, S., McKay, M. J., Horvath, L., Clarke, S. J. & Molloy, M. P., Sep 2009, In: European Journal of Cancer, Supplement. 7, 2, p. 112-112 1 p.

Targeted plasma proteome profiling for early prediction of chemotherapy response and toxicity in colorectal cancer (CRC)
Chua, W., Randall, S., Mckay, M. J., Horvath, L., Clarke, S. J. & Molloy, M. P., 20 May 2009, In: Journal of Clinical Oncology. 27, 15 supplement, p. 1-1 1 p., e15063.
How specific is my SRM? The issue of precursor and product ion redundancy
Sherman, J., McKay, M. J., Ashman, K. & Molloy, M. P., Mar 2009, In: Proteomics. 9, 5, p. 1120-1123 4 p.

A longitudinal study of the protein components of marsupial milk from birth to weaning in the tammar wallaby (Macropus eugenii)
Joss, J. L., Molloy, M. P., Hinds, L. & Deane, E., Feb 2009, In: Developmental and Comparative Immunology. 33, 2, p. 152-161 10 p.

Recent progress in selected reaction monitoring MS-driven plasma protein biomarker analysis
Chiu, C-L., Randall, S. & Molloy, M. P., 2009, In: Bioanalysis. 1, 4, p. 847-855 9 p.

Unique ion signature mass spectrometry, a deterministic method to assign peptide identity
Sherman, J., McKay, M. J., Ashman, K. & Molloy, M. P., 2009, In: Molecular and Cellular Proteomics. 8, 9, p. 2051-2062 12 p.

Differential proteome expression associated with urokinase plasminogen activator receptor (uPAR) suppression in malignant epithelial cancer
Saldanha, R. G., Xu, N., Molloy, M. P., Veal, D. A. & Baker, M. S., Nov 2008, In: Journal of Proteome Research. 7, 11, p. 4792-4806 15 p.

iTRAQ experimental design for plasma biomarker discovery
Song, X., Bandow, J., Sherman, J., David Baker, J., Brown, P. W., McDowell, M. T. & Molloy, M. P., Jul 2008, In: Journal of Proteome Research. 7, 7, p. 2952-2958 7 p.

Detection and quantification of polypeptides using mass spectrometry
Ashman, K., McKay, M., Sherman, J. & Molloy, M., 26 Jun 2008, (Submitted) IPC No. H01J 49/ 26 A I, G01N 27/62 2006.01, G01N 33/48 2006.01, Patent No. WO2008074067, 18 Dec 2007, Priority date 17 Jan 2007, Priority No. US20070885373P

Characterization of the rat liver membrane proteome using peptide immobilized pH gradient isoelectric focusing
Chick, J. M., Haynes, P. A., Molloy, M. P., Bjellqvist, B., Baker, M. S. & Len, A. C. L., Mar 2008, In: Journal of Proteome Research. 7, 3, p. 1036-1045 10 p.

Angiotensin II-inducible platelet-derived growth factor-D transcription requires specific Ser/Thr residues in the second zinc finger region of Sp1
Tan, N. Y., Midgley, V. C., Kavurma, M. M., Santiago, F. S., Luo, X., Peden, R., Fahmy, R. G., Berndt, M. C., Molloy, M. P. & Khachigian, L. M., Feb 2008, In: Circulation Research. 102, 4, p. e38-e51 14 p.

Isolation of bacterial cell membranes proteins using carbonate extraction
Molloy, M. P., 2008, In: Methods in molecular biology (Clifton, N.J.). 424, p. 397-401 5 p.

Extraction of Escherichia coil proteins with organic solvents prior to two-dimensional electrophoresis
Molloy, M. P., Herbert, B. R., Williams, K. L. & Gooley, A. A., 26 Dec 2007, From genome to proteome: advances in the practice & application of proteomics. Dunn, M. (ed.). Weinheim, Germany; New York: Wiley-Blackwell, Wiley, p. 121-124 4 p.

The development of multiple reaction monitoring assays for liver-derived plasma proteins
McKay, M. J., Sherman, J., Laver, M. T., Baker, M. S., Clarke, S. J. & Molloy, M. P., Dec 2007, In: Proteomics - Clinical Applications. 1, 12, p. 1570-1581 12 p.

Comparing SILAC and two-dimensional gel electrophoresis image analysis for profiling urokinase plasminogen activator signaling in ovarian cancer cells
Uitto, P. M., Lance, B. K., Wood, G. R., Sherman, J., Baker, M. S. & Molloy, M. P., Jun 2007, In: Journal of Proteome Research. 6, 6, p. 2105-2112 8 p.
Proteomic analysis of early lactation milk of the tammar wallaby (Macropus eugenii)
Joss, J., Molloy, M., Hinds, L. & Deane, E., Jun 2007, In: Comparative Biochemistry and Physiology - Part D: Genomics and Proteomics. 2, 2, p. 150-164 15 p.

Proteomic identification of lynchpin urokinase plasminogen activator receptor protein interactions associated with epithelial cancer malignancy
Saldanha, R. G., Molloy, M. P., Bdeir, K., Cines, D. B., Song, X., Utito, P. M., Weinreb, P. H., Violette, S. M. & Baker, M. S., Mar 2007, In: Journal of Proteome Research. 6, 3, p. 1016-1028 13 p.

Evaluation of endogenous plasma peptide extraction methods for mass spectrometric biomarker discovery
Aristoteli, L. P., Molloy, M. P. & Baker, M. S., Feb 2007, In: Journal of Proteome Research. 6, 2, p. 571-581 11 p.

A comparative study of gel based shotgun proteomic techniques using rat liver membrane protein
Lee, A., Chick, J., Haynes, P. A., Molloy, M., Baker, M. S., Uhlen, K., Hornsten, L., Bjellqvist, B. & Len, A., 2007, p. 54-54. 1 p.

Exploring the membrane subproteome utilizing shotgun peptide immobilized pH gradient - isoelectric focussing
Chick, J., Haynes, P. A., Molloy, M., Baker, M. S., Uhlen, K., Hornsten, L., Bjellqvist, B. & Len, A., 2007, p. 40-40. 1 p.

Exploring the rat liver membrane proteome using peptide immobilized pH Gradient isoelectric focussing (IPG-IEF)
Chick, J., Molloy, M., Haynes, P. A., Baker, M. S. & Len, A., 2007, In: ComBio 2007 Combined Conference abstracts. p. 74-74 1 p.

A comparison of immunodepletion strategies for plasma biomarker discovery
Baker, M. S., Khan, A., Lee, A., Shum, W. -K., Soon, J., Molloy, M. P., Polaskova, V., Tan, S. -H. & Kapur, A., Oct 2006, In: Molecular and Cellular Proteomics. 5, S10, p. S180-S180 1 p.

A novel approach for the depletion of high abundance proteins from human plasma
Kapur, A., Khan, A., Shum, W. -K., Tan, S. -H., Molloy, M. P., Polaskova, V. & Baker, M. S., Oct 2006, In: Molecular and Cellular Proteomics. 5, S10, p. S209-S209 1 p.

Development of peptidomic and proteomic biomarkers for colorectal cancer
Aristoteli, L. P., Clarke, S. J., Baker, M. S. & Molloy, M. P., Oct 2006, In: Molecular and Cellular Proteomics. 5, S10, p. S7-S7 1 p.

Optimisation of human plasma sample preparation using immunodepletion and DIGE for biomarker discovery
Khan, A., Soon, J., Kapur, A., Molloy, M. P. & Baker, M. S., Oct 2006, In: Molecular and Cellular Proteomics. 5, S10, p. S209-S209 1 p.

Evaluation of chemical derivatisation methods for protein identification using MALDI MS/MS
Joss, J. L., Molloy, M. P., Hinds, L. A. & Deane, E. M., Sep 2006, In: International Journal of Peptide Research and Therapeutics. 12, 3, p. 225-235 11 p.

Novel biochip platform for high-throughput MALDI MASS Spectrometry of peptides
Mariani, M., Aristoteli, L., Baker, M., Belisle, C., Molloy, M., Levy, M. & Walker II, J., Aug 2005, In: Molecular and Cellular Proteomics. 4, 8 suppl 1, p. S307-S307 1 p., 32.21.

Large-scale evaluation of quantitative reproducibility and proteome coverage using acid cleavable isotope coded affinity tag mass spectrometry for proteomic profiling
Molloy, M. P., Donohoe, S., Brzezinski, E. E., Kilby, G. W., Stevenson, T. I., Baker, J. D., Goodlett, D. R. & Gage, D. A., Apr 2005, In: Proteomics. 5, 5, p. 1204-1208 5 p.
Plenary: Drilling deeper into the proteome
Molloy, M. P., Kapur, A., Mariani, M. & Baker, M. S., 2005, p. 12611. 1 p.

Two-dimensional gel electrophoresis
Molloy, M. P. & McDowell, M. T., 2005, Two-dimensional gel electrophoresis. Garfin, D. & Ahuja, S. (eds.). San Diego, CA: ELSEVIER ACADEMIC PRESS INC, p. 123-145 23 p. (Separation Science and Technology; vol. 7).

Differential expression of the skeletal muscle proteome in mdx mice at different ages
Ge, Y., Molloy, M. P., Chamberlain, J. S. & Andrews, P. C., Aug 2004, In: Electrophoresis. 25, 15, p. 2576-2585 10 p.

Purification and characterization of a serine protease and chitinases from Paecilomyces lilacinus and detection of chitinase activity on 2D gels
Khan, A., Williams, K., Molloy, M. P. & Nevalainen, H., Dec 2003, In: Protein Expression and Purification. 32, 2, p. 210-220 11 p.

Exploring the proteome: Reviving emphasis on quantitative protein profiling
Molloy, M. P. & VanBogelen, R. A., Oct 2003, In: Proteomics. 3, 10, p. 1833-1834 2 p.

Overcoming technical variation and biological variation in quantitative proteomics
Molloy, M. P., Brzezinski, E. E., Hang, J., McDowell, M. T. & VanBogelen, R. A., Oct 2003, In: Proteomics. 3, 10, p. 1912-1919 8 p.

Proteomic analysis of mdx skeletal muscle: Great reduction of adenylate kinase 1 expression and enzymatic activity
Ge, Y., Molloy, M. P., Chamberlain, J. S. & Andrews, P. C., Oct 2003, In: Proteomics. 3, 10, p. 1895-1903 9 p.

The challenge of industrializing proteomics [1]
Molloy, M. P., 1 Jun 2003, In: Nature Biotechnology. 21, 6, p. 597 1 p.

Tracking pathophysiology with proteomics: adenylate kinase I is greatly reduced in skeletal muscle from MDX mice
Ge, Y., Molloy, MP., Chamberlain, J. S. & Andrews, PC., 15 Jul 2002, In: Journal of the Neurological Sciences. 199, p. S65-S65 1 p.

Proteomics: Technologies and applications
Molloy, M. P. & Witzmann, F. A., Feb 2002, In: Briefings in Functional Genomics and Proteomics. 1, 1, p. 23-39 17 p.

Profiling the alkaline membrane proteome of Caulobacter crescentus with two-dimensional electrophoresis and mass spectrometry
Molloy, M. P., Phadke, N. D., Chen, H., Tyldesley, R., Garfin, D. E., Maddock, J. R. & Andrews, P. C., 2002, In: Proteomics. 2, 7, p. 899-910 12 p.

Phosphopeptide derivatization signatures to identify serine and threonine phosphorylated peptides by mass spectrometry
Molloy, M. P. & Andrews, P. C., 15 Nov 2001, In: Analytical Chemistry. 73, 22, p. 5387-5394 8 p.

HSP22, a New Member of the Small Heat Shock Protein Superfamily, Interacts with Mimic of Phosphorylated HSP27 (3D HSP27)
Benndorf, R., Sun, X., Gilmont, R. R., Biederman, K. J., Molloy, M. P., Goodmurphy, C. W., Cheng, H., Andrews, P. C. & Welsh, M. J., 20 Jul 2001, In: Journal of Biological Chemistry. 276, 29, p. 26753-26761 9 p.

Analysis of the outer membrane proteome of Caulobacter crescentus by two-dimensional electrophoresis and mass spectrometry
Phadke, N. D., Molloy, M. P., Steinhoff, S. A., Ulintz, P. J., Andrews, P. C. & Maddock, J. R., May 2001, In: Proteomics. 1, 5, p. 705-720 16 p.
Two-dimensional electrophoresis and peptide mass fingerprinting of bacterial outer membrane proteins
Molloy, M. P., Phadke, N. D., Maddock, J. R. & Andrews, P. C., 2001, In: Electrophoresis. 22, 9, p. 1686-1696 11 p.

Two-dimensional electrophoresis of membrane proteins using immobilized pH gradients
Molloy, M. P., 10 Apr 2000, In: Analytical Biochemistry. 280, 1, p. 1-10 10 p.

Complementing genomics with proteomics: the membrane subproteome of Pseudomonas aeruginosa PA01
Nouwens, A. S., Cordwell, S. J., Larsen, M. R., Molloy, M. P., Gillings, M., Willcox, M. D. P. & Walsh, B. J., 2000, In: Electrophoresis. 21, 17, p. 3797-3809 13 p.

Membrane proteins and proteomics: Un amour impossible?
Santoni, V., Molloy, M. & Rabilloud, T., 2000, In: Electrophoresis. 21, 6, p. 1054-1070 17 p.

Proteomic analysis of the Escherichia coli outer membrane
Molloy, M. P., Herbert, B. R., Slade, M. B., Rabilloud, T., Nouwens, A. S., Williams, K. L. & Gooley, A. A., 2000, In: European Journal of Biochemistry. 267, 10, p. 2871-2881 11 p.

Serotype classification and characterisation of the rotavirus SA11 VP6 protein using mass spectrometry and two-dimensional gel electrophoresis
Emslie, K. R., Molloy, M. P., Barardi, C. R. M., Jardine, D., Wilkins, M. R., Bellamy, A. R. & Williams, K. L., 2000, In: Functional and Integrative Genomics. 1, 1, p. 12-24 13 p.

High-throughput mass spectrometric discovery of protein post-translational modifications
Wilkins, M. R., Gasteiger, E., Gooley, A. A., Herbert, B. R., Molloy, M. P., Binz, P. A., Ou, K., Sanchez, J. C., Bairoch, A., Williams, K. L. & Hochstrasser, D. F., 11 Jun 1999, In: Journal of molecular biology. 289, 3, p. 645-657 13 p.

Extraction of Escherichia coli proteins with organic solvents prior to two-dimensional electrophoresis
Molloy, M. P., Herbert, B. R., Williams, K. L. & Gooley, A. A., 1999, In: Electrophoresis. 20, 4-5, p. 701-704 4 p.

The Australian proteome analysis facility (APAF): assembling large scale proteomics through integration and automation
Walsh, B. J., Molloy, M. P. & Williams, K. L., Aug 1998, In: Electrophoresis. 19, 11, p. 1883-1890 8 p.

Improved protein solubility in two-dimensional electrophoresis using tributyl phosphate as reducing agent
Herbert, B. R., Molloy, M. P., Gooley, A. A., Walsh, B. J., Bryson, W. G. & Williams, K. L., May 1998, In: Electrophoresis. 19, 5, p. 845-851 7 p.

Development of mini-gel technology in two-dimensional electrophoresis for mass-screening of samples: application to tears
Glasson, M. J., Molloy, M. P., Walsh, B. J., Willcox, M. D. P., Morris, C. A. & Williams, K. L., 1998, In: Electrophoresis. 19, 5, p. 852-855 4 p.

Extraction of membrane proteins by differential solubilization for separation using two-dimensional gel electrophoresis
Molloy, M. P., Herbert, B. R., Walsh, B. J., Tyler, M. I., Traini, M., Sanchez, J-C., Hochstrasser, D. F., Williams, K. L. & Gooley, A. A., 1998, In: Electrophoresis. 19, 5, p. 837-844 8 p.

Establishment of the human reflex tear two-dimensional polyacrylamide gel electrophoresis reference map: new proteins of potential diagnostic value
Molloy, M. P., Bolis, S., Herbert, B. R., Ou, K., Tyler, M. I., Van Dyk, D. D., Willcox, M. D. P., Gooley, A. A., Williams, K. L. , Morris, C. A. & Walsh, B. J., Dec 1997, In: Electrophoresis. 18, 15, p. 2811-2815 5 p.

Identification of wallaby milk whey proteins separated by two-dimensional electrophoresis, using amino acid analysis and sequence tagging
Molloy, M. P., Herbert, B. R., Yan, J. X., Williams, K. L. & Gooley, A. A., Jun 1997, In: Electrophoresis. 18, 7, p. 1073-1078 6 p.
Prefractionation of protein samples prior to two-dimensional electrophoresis
Corthals, G. L., Molloy, M. P., Herbert, B. R., Williams, K. L. & Gooley, A. A., Mar 1997, In: Electrophoresis. 18, 3-4, p. 317-323 7 p.

Characterisation of wool Intermediate filament proteins separated by micropreparative two-dimensional electrophoresis
Herbert, B. R., Molloy, M. P., Yan, J. X., Gooley, A. A., Bryson, W. G. & Williams, K. L., 1997, In: Electrophoresis. 18, 3-4, p. 568-572 5 p.

Awards