

Lars Rönstrand

## Curriculum Vitae and List of Publications

### Lars Rönstrand



- Translational Cancer Research, Dept. Laboratory Medicine, Lund University, Medicin Village, Lund
- Lund Stem Cell Center, Dept. of Laboratory Medicine, Lund University, Lund
- EpiHealth Network
- Dept. of Hematology, Oncology and Radiation Physics, Skåne University Hospital, Lund

Affiliated with:

- Lund University Cancer Centre <https://www.lucc.lu.se/>
- Lund Stem Cell Center [https://www.med.lu.se/lund\\_stem\\_cell\\_center](https://www.med.lu.se/lund_stem_cell_center)
- StemTherapy [https://www.med.lu.se/lund\\_stem\\_cell\\_center/stemtherapy](https://www.med.lu.se/lund_stem_cell_center/stemtherapy)

<http://www.ronnstrandlab.com>

### Higher Education qualification(s):

BSc in Chemistry, Lund University 1982

Biomedical Education, Uppsala University, 1982

### Degree of Doctor:

1989; Medical and Physiological Chemistry, Uppsala University; "Purification, characterization and studies on the in vivo distribution of the B-type receptor for platelet derived growth factor". Supervisor: Prof. Carl-Henrik Heldin.

### Postdoctoral Positions:

1989-1990 Memorial Sloan-Kettering Cancer Center, New York, USA (mentor: Joan Massagué)

1991-1993 Ludwig Institute for Cancer Research, Uppsala (mentor: Carl-Henrik Heldin)

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**Qualification required for appointment as a docent:**

1994 Uppsala University (Molecular Cell Biology)

**Present Position:**

Professor of Molecular Medicine, Dept. of Laboratory Medicine, Lund,  
Lund University 2002-present

**Previous Positions and periods of appointment:**

Assistant Member, Ludwig Institute for Cancer Research, Uppsala 1993-1999

Associate Member, Ludwig Institute for Cancer Research, Uppsala 1999-2002

Higher researcher position in "Growth factors and their mechanism action" funded by the Swedish Research Council 2000-2005

**Interruption in research**

Parental leave 4 months, May-August 1999

**Courses I have taken during my time as professor at Lund University**

- Leadership course (Ledarskap i Kreativ Akademi 4; in total 7 days during 2003 and 2004) including jointly producing a proposal for reorganization of the Medical Faculty in Lund.
- Course in PhD supervision, Medical Faculty, Lund University 2003
- Pedagogic course in Problem-Based Learning (PBL) 2003
- Course on how to conduct annual staff appraisals 2006, 2018
- Course "How to deal with media, for leaders and researchers" 2009-11-26
- Course in gender equality and equal treatment "See the human being" ("Se människan"). Half-day, organized by the Committee for Gender Equality and Equal Treatment 2013-02-23

**Awards**

- EMBO Long Term Fellowship 1989-1990
- Ulla och Per-Eric Schybergs Foundation Prize 2004

**Supervision: PhD students as principal supervisor**

Simon Ekman (2000); Johan Lennartsson (2002); Anders Kallin (2003); Malin Pedersen (2009); Kristina Masson (2009); Elena Razumovskaya (2011); Bengt Phung (2013); Oscar Lindblad (2016); Sausan Moharram (2021)

**Supervision: PhD students as assistant supervisor**

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Peter Blume-Jensen (1995); Klaus Hansen (1996), Magnus Sundström (2001); Tobias Sjöblom (2002); Marie Fridberg (2009); Emma Henriksson (2012); Susann Reinbothe (2015); Alissa Marhäll (2018)

### **Supervision: Postdocs as principal supervisor**

Osamu Kozawa 941018-950811; Kerstin Thömmes 960601-980331; Muhammad Emaduddin 970619-990131; Akira Mogi 9.80601-000531; Patrik Wollberg 971117-000731; Enrico Bracco 000101-010831; Oleksandr Voytyuk 000801-041231; Jean-Baptiste Demoulin 001115-020801; Federica Chiara 020211-020801; Torben Österlund 021001-040931; Elke Heiss 030601-050801; Christina Sundberg 030901-060901; Tao Liu 051001-070425; Rasheed Khan 071001-091014; Clara Isabel Aceves 090901-100901; Shruti Agarwal, 101201-120901; Tine Thingholm 2011-2013; Sachin Raj, 160315-170601; Julhash U. Kazi 100308-150101; Rohit Chougule, 140908-180801; Jianmin Sun 041001-210401; Saleena Younus 230601-

### **Thesis examination**

PhD thesis Faculty Examiner at 18 PhD dissertations:

- Birgitte Ursø Hagedorn Research Institute, Copenhagen, 1996
- Elisabeth Douglas Galsgaard, Hagedorn Research Institute, Copenhagen, 1997
- Lena Stenson-Holst, Department of Cell and Molecular Biology, Lund, 1998
- Jan Amstrup, Hagedorn Research Institute, Copenhagen, 1999
- Nikolaj Blom. Technical University of Denmark, Copenhagen, 1999
- Anna Karina Busch, Hagedorn Research Institute, Copenhagen, 1999
- Lone Finnerup Juhl, Hagedorn Research Institute, Copenhagen, 1999
- Jannik Andersen, Panum Institute, Copenhagen, 2001
- Leonard Girmata, Karolinska Institute, 2002
- Maria Henriksson, Umeå University 2003
- Hong Xu, Karolinska Institute 2006
- Eystein Oveland, Bergen, Norway 2008
- Stine Skovbo Olsen, Copenhagen May 2010
- Mats Dehlin, Gothenburg, 2012
- Bo Rafn, Copenhagen May 17, 2013
- Alamdar Hussain, Karolinska Institute June 13, 2013
- Christina Dahl, Copenhagen March 24, 2014
- Manuela Gustafsson, Karolinska Institute. September 9, 2017

### **Grant reviewing**

- Chairman of Evaluation Committee F1 (Basic disease mechanisms – molecular, cellular and biochemical aspects). Swedish Research Council 2018 and 2019.
- Member of Evaluation Committee F1 (Basic disease mechanisms – molecular, cellular and biochemical aspects) Swedish Research Council 2012 and 2017;
- Member of Evaluation Committee F2 (Basic disease mechanisms – molecular, cellular and biochemical aspects) Swedish Research Council 2009 and 2011
- Member of evaluation committee B1 (Gene regulation, biochemistry, structural biology), Swedish Cancer Society, 2019, 2021,2022, 2023.
- Member of evaluation committee Norwegian Cancer Foundation (Peer Review Committee 1: Basic research 1) 2018.
- Member of evaluation committee for cancer applications to the Norwegian Research Council 2004
- Karolinska Institute (evaluation of junior researcher positions) 2011, 2013-2017
- Ad hoc reviewer for several research organizations, including Association for International Cancer Research (AICR), Swiss National Science Foundation, The Academy of Finland, Research Council for Health and Research Council for Environment and Natural Resources, Italian Cancer Foundation, Belgian Cancer Foundation, North West Cancer Research Fund (UK), STINT, French National Cancer Institute, Fondation pour la Recherche Médicale (France), Fonds National de la Recherche Luxembourg, Deutsche Forschungsgemeinschaft, The Wellcome Trust, Leukaemia & Lymphoma Research (UK) Swedish Research Council-Natural Sciences, Bergen Research Foundation (Norway), Cancer Research UK, Cancer Research Wales, Medical Research Council (UK), Czech Science Foundation, Israel Science Foundation, The National Centre for Research and Development in Poland, Wellcome Trust, (UK)

### **Membership in professional societies**

- American Society of Hematology (ASH)
- American Association for Cancer Research (AACR)
- European Hematology Association (EHA)
- Royal Physiographic Society, Lund, Sweden. Elected member

### **Commissions of Trust**

- Organizer (together with Arne Östman) of “UICC Advanced Course on Cell Signaling and Cancer”, Tammsvik Conference Center, Sweden August 5-8, 1999

## Lars Rönstrand

- Member of the Steering Committee (Institutionsstyrelse) at the Dept. of Laboratory Medicine, Malmö 2003-2012
- Head of the Division of Experimental Clinical Chemistry, Dept. of Laboratory Medicine, Malmö 2002-2004 (until it through a reorganization of the Medical Faculty 2005 formed a part of the Section of Clinical Chemistry)
- Member of the Board of Malmö Cancer Center 2005-2013
- Chairman of the equipment grant committee at Malmö Cancer Center 2006-2007
- Co-organizer of Malmö Cancer Seminars 2004-2009
- Organizer (together with prof. Eiríkur Steingrímsson) of the conference “Melanocytes and Melanoma – from basic science to clinical applications”, Malmö June 18-20, 2012
- Vice-chairman of the Postgraduate Training Committee (Forskarutbildningskommittén) at the Medical Faculty, Lund University 2009-2012
- Acting chairman of the Postgraduate Training Committee (Forskarutbildningskommittén) at the Medical Faculty, Lund University January 1<sup>st</sup>, 2012 – February 28, 2012 (awaiting appointment of a new vice-dean)
- Member of the Committee for Gender Equality, Equal Opportunities and Diversity (Kommittén för jämställdhet och likabehandling), Medical Faculty, Lund 2012-2013
- Chairman of the steering committee organizing Lund University Cancer Center Seminars, Medicon Village, Lund 2014
- Member of Brand Management Committee, Medicon Village 2013- now
- Member of the editorial board of Lund Medical Faculty Monthly (LMFM) 2016
- Co-organizer of Focus on Cancer Collaboration, Medicon Village, Lund, March 12, 2019, a conference meant to facilitate collaborations between academia, hospital and industry. I invited Prof. Joseph Schlessinger as keynote lecturer due to his excellence in science combined with excellent entrepreneurship
- Deputy Head of the Division of Translational Cancer Research, 2019- now
- Chairman of panel 2: Basic and Translational Cancer Research, Research and Quality Assessment 2020 (RQ20), an evaluation of the quality of research at Lund University

### **Expert Witness**

- Expert Witness in the patent infringement litigation T-833-11 Apotex Inc. v. Novartis AG. September, 2012 Toronto, Canada. This process dealt with the Canadian patent of Gleevec.
- Expert Witness in the patent litigation T-2021-10 Teva Canada Limited v. Novartis AG. September, 2012 Toronto, Canada. This process dealt with the Canadian patent of Gleevec.

### **Connections with industry**

Lars Rönstrand

- Advisor for BioMarin Pharmaceuticals, San Rafael, California 2014
- Founder and chairman, PhosphoDynamics AB 2016-

### **Other merits**

In 2023 ranked by Expertscape as the top 0.62 % scholar writing about Proto Oncogene c-kit from 2013 through 2023 <https://expertscape.com/au/proto-oncogene+proteins+c-kit/R%C3%B6nnstrand%2C+L>

Ranked as number 18 of all molecular biologists in Sweden 2023 by research.com (<https://research.com/u/lars-ronnstrand> )

### **Patents**

- U.S. Patent No: 5,229,495: Ichijo H, Miyazono K, Rönstrand L, Hellman U, Wernstedt C and Heldin CH “Substantially pure receptor like TGF-beta binding molecules and uses thereof”. 1993-07-19;
- U.S. Patent No: 5,578,703 Ichijo H, Miyazono K, Rönstrand L, Hellman U, Wernstedt C and Heldin CH “Substantially pure receptor like TGF-beta1 binding molecules.” 1996-11-25
- US Patent No: 5,731,200 Ichijo H, Miyazono K, Rönstrand L, Hellman U, Wernstedt C and Heldin CH “Isolated nucleic acid encoding receptor-like TGF-beta1 binding protein.” 1998-03-23

### **Teaching**

Apart from supervision of numerous PhD students and postdocs, I have been involved in teaching of the students at the Medical School and students at the Biomedicine Program.

Summary of my teaching since joining Lund University in 2002:

- Tutor at the 4<sup>th</sup> semester of Medical School, Malmö (problem-based learning) 2003-2013. This semester is focused on microbiology, virology and tumor biology
- Tutor at the 3<sup>rd</sup> semester of Medical School, Lund (problem-based learning) 2013-present. This semester is focused on homeostasis
- Lecture on “Growth factors and cancer- basic principles”, 4<sup>th</sup> semester Medical School, Malmö. Every semester since 2007 - present
- Lecture “Growth factor and cytokine signalling”. Biomedicine Program, 2 lectures. 2006-2018
- Lecture at Tumor biology course, Lund University “Growth factors in cancer” 2005-2015, 2017-2024
- Lecture on “Growth factor signaling in cancer. Functional and therapeutic implications” at a meeting organized by Svensk Onkologisk Förening for MD specialists in training. 2003-03-15
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## Publications

In total 160 publications (PubMed 24-01-16). Web of Science: 212 publications (24-01-16), 10,723 citations, H-index 54. Google Scholar Citations: 261 publications, 16727 citation H-index 67. ORCID ID 0000-0003-1275-5809

### *Original publications*

1. Younus S, **Rönstrand L** and Kazi JU (2024) Xputer: Bridging Data Gaps with NMF, ZGBoost and a Streamlined GUI Experience. **arXiv**:2311.09989
2. Nasimian A., Younus S., Tatli Ö., Hammarlund E.U., Pienta K.J., **Rönstrand L.** and Kazi J.U. (2024) AlphaML: a clear legible, explainable, transparent, and elucidative binary classification platform for tabular data. **Patterns**.5, 100897
3. Kazi JU, Al Ashiri L, Purohit R, **Rönstrand L** (2023) Understanding the Role of Activation Loop Mutants in Drug Efficacy for FLT3-ITD. **Cancers** 15(22), 5426
4. Chen H, Bai Y, Kobayashi M, Xiao S, Barajas S, Cai W, Chen S, Miao J, Ngeue Meke F, Yao C, Yang Y, Strube K, Satchivi O, Sun J, **Rönstrand L**, Croop JM, Boswell HS, Jia Y, Liu H, Li LS, Altman JK, Eklund EA, Sukhanova M, Ji P, Tong W, Band H, Huang DT, Plataniias LC, Zhang ZY, Liu Y. (2024) PRL2 phosphatase promotes oncogenic KIT signaling in leukemia cells through modulating CBL phosphorylation **Mol Cancer Res** 22(1), 94-103
5. Nasimian A, Al Ashiri L, Ahmed M, Duan H, Zhang X, **Rönstrand L**, Kazi JU (2023) A receptor tyrosine kinase inhibitor sensitivity prediction model identifies AXL dependency in leukemia. **Int J Mol Sci** 24,3830
6. Emdal KB, Palacio-Escat N, Wigerup C, Eguchi A, Nilsson H, Bekker-Jensen DB, Rönstrand L, Kazi JU, Puissant A, Itzykson R, Saez-Rodriguez J, Masson K, Blume-Jensen P, Olsen JV. (2022) Phosphoproteomics of primary AML patient samples reveals rationale for AKT combination therapy and p53 context to overcome selinexor resistance. **Cell Rep** 40(6):111177
7. Nordgaard C, Doll S, Matos A, Hoeberg M, Kazi J, Friis S, Stenvang J, **RönstrandL**, Mann M, Moreira J (2019) Metalloproteinase inhibitor 1 (TIMP-1) promotes receptor tyrosine kinase c-Kit signaling in colorectal cancer. **Mol Onc** 13(1):2646- 2662
8. Moharram SA, Shah K, Khanum F, **Rönstrand L** and Kazi JU (2019) The ALK inhibitor ADZ3463 effectively inhibits growth of sorafenib-resistant acute myeloidleukemia. **Blood Cancer J** 9:5 Letter
9. Li T, Deng Y, Shi Y, Tian R, Chen Y, Zou L, Kazi JU, **Rönstrand L**, Feng B, ChanSO, Chan W-Y, Sun J, and Zhao H (2018) Bruton's tyrosine kinase

- potentiates ALK signaling and serves as a potential therapeutic target of neuroblastoma. **Oncogene** 37,6180-6194
10. Sun J, Thingholm T, Højrup P and **Rönstrand L** (2018) XK-related protein 5 (XKR5) is a novel negative regulator of KIT/D816V-mediated transformation. **Oncogenesis** 7(6): 48
  11. Hyrenius-Wittsten A, Pilheden M, Stureson H, Hansson J, Walsh MP, Song G, Kazi JU, Liu J, Ramakrishnan R, Garcia Ruiz C, Nance S, Gupta P, Zhang J, **Rönstrand L**, Hultquist A, Downing JR, Lindkvist-Petersson K, Paulsson K, Järås M, Gruber TA, Ma J and Andersson AK (2018) *De novo* activating mutations drive clonal evolution and enhance clonal fitness in KMT2A-rearranged leukemia. **Nat Commun** 9(1):1770
  12. Rupar K, Moharram SA, Kazi JU and **Rönstrand L** (2018) Src-like adaptor protein 2 (SLAP2) is a negative regulator of KIT-D816V-mediated oncogenic transformation. **Sci Rep** 8(1): 6405
  13. Marhäll A, Heidel F, Fischer T, **Rönstrand L** (2018) Internal tandem duplication mutations in the tyrosine kinase domain of FLT3 display a higher oncogenic potential than the activation loop D835Y mutation. **Ann Hematol** 97(5), 773-780
  14. Marhäll A, Kazi JU\*, Rönstrand L\* (2017) The Src family kinase LCK cooperates with oncogenic FLT3/ITD in cellular transformation. **Sci Rep** 7, 13734
  15. Kazi JU, Chougule RA, Li T, Su X, Moharram SA, Rupar K, Marhäll A, Gazi M, Sun J, Zhao H and **Rönstrand L** (2017) Tyrosine 842 in the activation loop is required for full transformation by the oncogenic mutant FLT3-ITD. **Cell Mol LifeSci** 74, 2679-2688
  16. Kazi JU, Rupar K, Marhäll A, Moharram, SA, Khanum F, Shah K, Mohiuddin G, Nagaraj SRM, Sun J, Chougule RA, **Rönstrand L** (2017). ABL2 suppresses FLT3-ITD-induced cell proliferation through negative regulation of AKT signaling. **Oncotarget** 8, 12194-12202
  17. Moharram SA, Chougule RA, Su X, Li, T, Sun J, Zhao H, **Rönstrand L** and Kazi JU (2016) Src-like adaptor protein 2 (SLAP2) binds to and inhibits FLT3 signaling. **Oncotarget** 7, 57770-82
  18. Lindblad O, Cordero E, Puissant A, Macaulay L, Kabir NN, Sun J, Haraldsson K, Borg Å, Levander F, Stegmaier K, Pietras K, **Rönstrand L** and Kazi JU. (2016) Aberrant Activation of the PI3K/mTOR Pathway Promotes Resistance to FLT3 Inhibition in AML. **Oncogene** 35, 5119-31
  19. Chougule, RA, Cordero, E, Moharram SA, Pietras K, **Rönstrand L** and Kazi JU (2016) Expression of GADS enhances FLT3-induced mitogenic signaling.



**Oncotarget** 7, 14112-24

20. Alam MW, Persson CU, Reinbothe S, Kazi JU, **Rönstrand L**, Wigerup C, Ditzel HJ, Lykkesfeldt AE, Pählman S and Jögi A (2016) HIF2alpha contributes to antiestrogen resistance via positive bilateral crosstalk with EGFR in breast cancer cells.

**Oncotarget** 7, 11238-50

21. Chougule R, Kazi JU and **Rönstrand L** (2016) FYN expression potentiates FLT3-ITD-induced STAT5 signaling in acute myeloid leukemia. **Oncotarget** 7, 9964-74
22. Lindblad O, Chougule R, Moharram SA, Kabir NN, Sun J, Kazi JU and **Rönstrand L** (2015) The role of HOXB2 and HOXB3 in acute myeloid leukemia. **Biochem Biophys Res Commun** 467, 742-7
23. Zhang J, Vakhrusheva O, Bandi SR, Demirel Ö, Kazi JU, Gomes Fernandes R, Jakobi K, Eichler A, **Rönstrand L**, Rieger M, Carpino N, Serve H and Brandts CH (2015) The phosphatases STS1 and STS2 regulate hematopoietic stem and progenitor cell fitness. **Stem Cell Reports** 5, 633-646
24. Lindblad O, Li T, Su X, Sun J Kabir NN, Levander F, Zhao H, Lu G, **Rönstrand L** and Kazi JU (2015) BEX1 acts as a tumor suppressor in acute myeloid leukemia. **Oncotarget** 6, 21395-405
25. Lindblad O, Kazi JU, **Rönstrand L**, Sun J (2015) PI3 kinase is indispensable for oncogenic transformation by the V560D mutant of c-Kit in a kinase-independent manner. **Cell Mol Life Sci** 72, 4399-407
26. Agarwal S, Kazi JU, Mohlin S, Pählman S and **Rönstrand L** (2015) The activation loop tyrosine 823 is essential for the transforming capacity of the c-Kit oncogenic mutant D816V. **Oncogene** 34, 4581-90
27. Kabir NN, **Rönstrand L** and Kazi JU (2014) Keratin 19 expression correlates with poor prognosis in breast cancer. **Mol Biology Rep** 41, 7729-35
28. Puissant A, Fenouille N, Alexe G, Pikman Y, Bassil CF, Mehta S, Du J, Kazi JU, Luciano F, **Rönstrand L**, Kung AL, Aster JC, Galinsky I, Stone RM, DeAngelo DJ, Hemann MT and Stegmaier, K (2014) SYK is a critical regulator of FLT3 in acute myeloid leukemia. **Cancer Cell** 25, 226–242
29. Reinbothe S, Larsson AM, Vaapil M, Wigerup C, Sun J, Jögi A, Neumann D, **Rönstrand L**, Pählman S (2014) EPO-independent functional EPO receptor in breast cancer enhances estrogen receptor activity and promotes cell proliferation **Biochem Biophys Res Commun** 445, 163-9. 2014
30. Kazi JU, Agarwal S, Sun J, Bracco E, and **Rönstrand L** (2014) Src-Like Adaptor Protein (SLAP) differentially regulates normal and oncogenic c-Kit signaling. **J Cell**

**Sci** , 653-662

31. Sun J, Mohlin S, Lundby A, Hellman U, Pålman S, Olsen JS and **Rönstrand L** (2014) The PI3-kinase isoform p110delta is essential for D816V/c-Kit mediated tumor formation in a manner independent of its lipid kinase activity. **Oncogene** 33, 5360-9
32. Phung B, Steingrímsson E and **Rönstrand L** (2013) Differential activity of c-KIT splice forms is controlled by extracellular peptide insert length. **Cell Signal**, 2231-8
33. Kabir NN, **Rönstrand L**, Kazi JU (2013) The basic helix-loop-helix (bHLH) proteins in breast cancer progression. **Med Oncol** 30, 666. Letter
34. Agarwal S, Kazi JU, **Rönstrand L**. (2013) Phosphorylation of the activation loop tyrosine 823 in c-Kit is crucial for cell survival and proliferation. **J Biol Chem** 288, 22460-8
35. **Rönstrand L**, Phung B. (2013) Enhanced SOX10 and KIT expression in cutaneous melanoma. **Med Oncol** 30, 648. Letter
36. Kazi JU, Vaapil M, Agarwal S, Bracco E, Pålman S, **Rönstrand L**. (2013) The tyrosine kinase CSK associates with FLT3 and c-Kit receptors and regulates downstream signaling. **Cell Signal** 25, 1852-60
37. Kazi JU, Sun J and **Rönstrand L** (2013) Suppressor of cytokine signaling 2 (SOCS2) associates with FLT3 and negatively regulates downstream signaling. **Mol Oncol** 7, 693-703
38. Kazi JU, Sun J and **Rönstrand L** (2013) The presence or absence of IL-3 during long-term culture of Flt3-ITD and c-Kit-D816V expressing Ba/F3 cells influences signaling outcome. **Exp Hematol** 41, 585-7. Letter
39. Kabir NN, **Rönstrand L** and Kazi JU (2013) Deregulation of protein phosphatase expression in acute myeloid leukemia. **Med Oncol** 30, 517. Letter
40. Kabir NN, **Rönstrand L** and Kazi JU (2013) Protein Kinase C expression is deregulated in chronic lymphocytic leukemia. **Leuk Lymphoma** 54, 2288-90
41. Kabir NN, **Rönstrand L** and Kazi JU (2013) FLT3 mutations in patients with childhood acute lymphoblastic leukemia (ALL) **Med Oncol** 30, 462. Letter
42. Kazi JU and **Rönstrand L** (2012) Src-like adaptor protein (SLAP) binds to the receptor tyrosine kinase Flt3 and modulates receptor stability and downstream signaling. **PLOS One** 7, e53509
43. Kazi JU and **Rönstrand L** (2012) FLT3 signals via the adapter protein Grb10 and overexpression of Grb10 leads to aberrant cell proliferation in acute myeloid leukemia. **Mol Oncol** 7, 402-18
44. Kazi JU, Sun J, Phung B, Zadjali F, Flores-Morales A, **Rönstrand L** (2012)

- Suppressor of Cytokine Signaling 6 (SOCS6) Negatively Regulates Flt3 Signal Transduction through Direct Binding to Phosphorylated Tyrosines 591 and 919 of Flt3. **J Biol Chem** 287, 36509-17
45. Lin DC, Yin T, Koren-Michowitz M, Ding LW, Gueller S, Gery S, Tabayashi T, Bergholz U, Kazi JU, **Rönstrand L**, Stocking C, Koeffler HP.(2012) Adaptor protein Lnk binds to and inhibits normal and leukemic FLT3. **Blood** 120, 3310-7
46. Leischner H, Albers C, Grundler R, Razumovskaya E, Spiekermann K, Bohlander SK,**Rönstrand L**, Götzke KS, Peschel C and Duyster J (2012) SRC is a signaling mediator in FLT3-ITD but not in FLT3-TDK positive-AML. **Blood** 119, 4026-33
47. Munksgaard Persson M, Johansson ME, Monsef N, Planck M, Beckman S, Seckl M,**Rönstrand L**, Pählman S, Pettersson HM. (2012) HIF-2 $\alpha$  expression is suppressed in SCLC cells, which survive at moderate and severe hypoxia by HIF-independent mechanisms. **Am J Pathol** 180, 494-504
48. Heidel FH, Razumovskaya E, Mack TS, Blum M-C, Lipka DB, Ballaschk A, Borrmann A-K, Kramb J-P, Plutizki S, **Rönstrand L**, Dannhardt G and Fischer T (2012) 3,4-Diarylmaleimides – a novel class of kinase inhibitors effectively induce apoptosis in FLT3-ITD dependent cells. **Ann Hematol** 91, 331-44
49. Phung B, Sun J, Steingrimsson E, **Rönstrand L** (2011) C-Kit Signaling Depends on Microphthalmia- Associated Transcription Factor for Effects on Cell Proliferation. **PLoS ONE** 6, e24064
50. Nordigården A, Zetterblad J, Trinks C, Gréen H, Eliasson P, Druid P, Lotfi K, **Rönstrand L**, Walz TM, Jönsson JI (2011) Irreversible pan-ERBB inhibitor canertinib elicits anti-leukaemic effects and induces the regression of FLT3-ITD transformed cells in mice **Brit J Haematol** 155, 198-208
51. Razumovskaya E, Sun J and **Rönstrand L** (2011) Inhibition of MEK5 by BIX02188 induces apoptosis in cells expressing the oncogenic mutant FLT3-ITD. **Biochem Biophys Res Commun** 412, 307-312
52. Kharazi S, Mead AJ, Mansour A, Hultquist A, Böiers C, Luc S, Buza-Vidas N, Ma Z, Ferry H, Atkinson D, Reckzeh K, Masson K, Cammenga J, **Rönstrand L**, Arai F, Suda T, Nerlov C, Sitnicka E, Jacobsen SE (2011) Impact of gene dosage, loss of wild type allele and FLT3 ligand on Flt3-ITD induced myeloproliferation **Blood** 118, 3613-21
53. Arora D, Stopp S, Böhmer SA, Schons J, Godfrey R, Masson K, Razumovskaya E, **Rönstrand L**, Böhmer FD and Müller JP (2011) Protein tyrosine phosphatase Dep-1

- controls receptor tyrosine kinase FLT3 signalling **J Biol Chem** 286, 10918-29
54. Al-Zadjali F, Pike AC, Vesterlund M, Sun J, Wu C, **Rönstrand L**, Knapp S, Bullock AN and Flores-Morales A (2011) Structural basis for c-KIT inhibition by the suppressor of cytokine signaling 6 (SOCS6) ubiquitin ligase. **J Biol Chem** 286, 480-490
55. Razumovskaya E, Masson K, Khan R, Bengtsson S and **Rönstrand L** (2009) Oncogenic Flt3 receptors display different specificity and kinetics of autophosphorylation. **Exp Hematol** 37, 979-89
56. Masson K, Liu T, Sun J and **Rönstrand L** (2009) A role of Gab2 association in Flt3-ITD mediated STAT5 phosphorylation and cell survival. **Br J Haematol** 146, 193-202
57. Sun J, Pedersen M, and **Rönstrand L** (2009) The D816V mutation of c-Kit circumvents a requirement for Src family kinases in c-Kit signal transduction. **J Biol Chem** 284, 11039-11047
58. Breitenbuecher F, Markova B, Kasper S, Carius B, Stauder T, Böhmer FD, Masson K, **Rönstrand L**, Huber C, Kindler T and Fischer T (2009) A novel Molecular Mechanism of Primary Resistance to FLT3-Kinase Inhibitors in Acute Myeloid Leukemia. **Blood** 113, 4063-4073
59. Pedersen M, **Rönstrand L**, and Sun J (2009) The c-Kit/D816V mutation eliminates the differences in signal transduction and biological responses between two isoforms of c-Kit. **Cell Signal** 21, 413-418
60. Pedersen M, Löfstedt T, Sun J, Holmquist-Mengelbier L, Pålman S and **Rönstrand L** (2008) Stem cell factor induces HIF-1alpha at normoxia in hematopoietic cells. **Biochem Biophys Res Commun** 377, 98-103
61. Sun J, Pedersen M and **Rönstrand L** (2008) GAB2 is involved in differential PI3-kinase signaling by two splice forms of c-Kit. **J Biol Chem** 283, 27444-27451
62. Ceder JA, Jansson L, Ehrnström RA, **Rönstrand L**, Abrahamsson PA (2008) The characterization of epithelial and stromal subsets of candidate stem/progenitor cells in the human adult prostate. **Eur Urol** 53, 524-31
63. Sun J, Pedersen M, Bengtsson S and **Rönstrand L** (2007) Grb2 mediates negative regulation of the stem cell factor receptor/c-Kit by recruitment of Cbl. **Exp Cell Res** 313, 3935-42
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