

BIOGRAPHICAL SKETCH

NAME: Huber, Veronica Barbara

AFFILIATION: Translational Immunology Unit, Fondazione IRCCS Istituto Nazionale dei Tumori, Milan, Italy

POSITION TITLE: Senior Staff Scientist

EDUCATION/TRAINING

INSTITUTION AND LOCATION	DEGREE	Completion Date	FIELD OF STUDY
European School Varese (Italy)	Baccalaureate	1990	High School
Westfälische Wilhelms-Universität Münster (Germany)	Medical Internship	1996-1998	Internal Medicine/Pharmacology and Toxicology
Westfälische Wilhelms-Universität Münster (Germany)	MD	2000	Human Medicine
Open University (UK) at Unit of Immunotherapy of Human Tumors, INT	PhD	01/2007	Life Sciences, Thesis title: <i>"Expression of pro-apoptotic molecules by tumour cells and their role in tumour immune escape"</i>
Unit of Immunotherapy of Human Tumors, INT	Postdoc	2007-2010	Tumor immunology
Translational Immunology Unit INT (former: Unit of Immunotherapy of Human Tumors, INT)	Team leader of the Immunomonitoring and Immune Escape Laboratory	Since 2011	Tumor immunology, myeloid-derived suppressor cells, immune suppression and escape and extracellular vesicles (EVs), immune monitoring, biomarkers, immunotherapy resistance mechanisms

Personal Statement

Veronica Huber has a longstanding expertise in tumor immunology and a specific interest in translational research based on clinical need. The Translational Immunology Unit (former Unit of Immunotherapy of Human Tumors) led by Licia Rivoltini, where she works since 2001 after completing her medical studies in Germany, combines clinical experience with established skills in immunomonitoring and genetics, focusing on immune suppression related pathways and immune players. After joining the research group, Veronica contributed to pioneering studies on exosomes, members of the Extracellular Vesicle (EV) family, and her passion for these nanometer-sized vesicles and immune suppressive mechanisms led her to enroll into a PhD project in EV-centered tumor immune escape mechanisms. As postdoc and later on as experienced scientist she continued focusing her research on EV-associated suppressive pathways in cancer patients and in these last years on immune monitoring and the resistance mechanisms to current cancer treatments, such as immunotherapies with immune checkpoint inhibitors and targeted therapies.

Positions, Scientific Appointments, and Honors

2004 AACR-Pezcoller Foundation Scholar-in-Training Award, Pezcoller Foundation

1999 Schmiedeberg-Award, German Society Experimental, Clinical Pharmacology & Toxicology, Mainz, Germany

Reviewer for Journals: International Journal of Molecular Sciences; Cell Death and Disease; European Journal of Cancer; Cancer Immunology, Immunotherapy; Clinical Cancer Research; European Journal of Pharmaceutical Sciences; Integrative Cancer Therapies; Journal of Extracellular Vesicles; Theranostics; Cell Biology and Toxicology; Clinical Science; Ecancermedicallscience; International Journal of Pharmaceutics; Journal of Investigative Dermatology; Medicinal Research Reviews; PLOS One; Scientific Reports; Tumor Biology; Future Science; Advances in Clinical Chemistry; Journal of Clinical Medicine; Journal of Extracellular Vesicles; Clinical and Translational Medicine; FEBSOpen; J Immunother of Cancer.

Reviewer for Scientific Foundations (grant applications): Agency for Health Quality and Assessment of Catalonia (AQuAS), Spain; Israel Science Foundation.

Member of Scientific Societies: American Association for Cancer Research (AACR) 2004-2008; International Society for Proton Dynamics in Cancer (ISPDC) 2010-2013; Società Italiana di Cancerologia (SIC) 2014; International Society for Extracellular Vesicles (ISEV) 2012-2012, 2016, 2018-2019, 2020-2023

Editor of Journals: "Tumori" (2014); Journal of Extracellular Vesicles (JEV, from 2020)

Book chapters: Huber V, Filipazzi P, Rivoltini L. Tumor Exosomes and Their Impact on Immunity and Cancer progression. Cancer Immunotherapy (Second Edition) – Immune Suppression and Tumor Growth. (Eds.) George C. Prendergast and Elizabeth M. Jaffee, 2013, Elsevier.

Valenti R, Huber V, Filipazzi P, Iero M, Parmiani G, Rivoltini L. Tumor-Derived Exosomes as Dendritic Cell Modulators. Dendritic Cells in Cancer. (Eds.) Shurin MR; Salter RD, 2009, Springer

Contributions to Science

2001–2004: PhD student 2002-2006, Unit of Immunotherapy of Human Tumors, Fondazione IRCCS Istituto Nazionale Tumori, Milan. Topics: Phenotypic and functional analysis of FasL and TRAIL in colorectal carcinoma cells and release via microvesicles/exosomes. Identification and quantification of colorectal cancer (CRC) microvesicles in plasma of CRC patients by an ad hoc set up modified CEA-RIA. Pioneering studies on tumor exosomes in tumor immune escape mechanisms: FasL expression by melanoma cells and extracellular release of FasL via microvesicles. Identification of such vesicles as exosomes and evaluation of their pro-apoptotic activity on T cells.

2005–2010: Postdoc researcher since 2007, Unit of Immunotherapy of Human Tumors, Fondazione IRCCS Istituto Nazionale Tumori, Milan. Topics: Activity of breast cancer-derived exosomes in countering efficacy of Trastuzumab & Lapatinib therapy. Role of granulocytes in maintenance of chronic inflammation and immune suppression in melanoma, prostate cancer and NHL patients. Analysis of immune suppressive activity of tumor-derived exosomes (melanoma and colorectal cancer) on monocyte differentiation and generation of monocytic myeloid-derived suppressor cells (MDSCs). Pro-apoptotic effects of colorectal cancer patients'-derived exosomes on antigen specific T cells.

2011-today: Team leader of the Immunomonitoring and Immune Escape Laboratory, Translational Immunology Unit (former: Unit of Immunotherapy of Human Tumors), Fondazione IRCCS Istituto Nazionale dei Tumori, Milan. Topics: Granulocytic & monocytic MDSCs in cancer patients. Role of tumor extracellular vesicles (EVs) in the generation of MDSCs and involved microRNAs. TRAIL-armed exosomes as novel anti-tumor therapy. Extracellular vesicles in sera/plasma of cancer patients as novel biomarkers of cancer. Study of pH regulators in hepatocellular cancer as potential targets for therapy. Identification of immune-related response/resistance mechanisms and biomarkers detectable in the liquid biopsy of cancer patients undergoing immune- and other cancer therapies in different clinical settings.

Funding

(2024-2025) Co-PI, 5xmille funds for healthcare research (Ministry of Health). Project: "Understanding tumor and immune dynamics and predicting poor outcome to intravesical therapies (bcg) in patients with non-muscle-invasive bladder cancer (nmibc) that had progressed in locally advance/metastatic disease". Amount: 50.000,00 €.

(2021-2015) PI, AIRC IG-25078. Project "Genetic and epigenetic regulation of local and systemic myeloid cells in response to immunotherapy of cancer patients". Amount: 727.000,00 €.

(2019-2020) PI, 5xmille funds for healthcare research (Ministry of Health). Project: "Circulating extracellular vesicles as biomarker of therapeutic immune modulation in cancer patients" Amount: 40.000,00 €.

(2006–2008) PI, AIRC IG-4420. Project: "Role of granulocytes in maintenance of chronic inflammation and immune suppression in cancer patients": Amount: 135.000,00 €.

Publications

1. Cerioli N, Bououdina W, Mereu A, Natsaridis E, Salsetta J, Cova A, Lupoli G, D'Angelo E, Rivoltini L, Figdor CG, **Huber V***, Tagit O. Reprogramming the melanoma and immunosuppressive myeloid cells with esomeprazole-loaded PLGA nanoparticles. iScience, under review. ***Corresponding and co-last author**
2. Franchin M, Vergani B, **Huber V**, Leone BE, Villa A, Muscato P, Cervarolo MC, Piffaretti G, Tozzi M. Proposal of a classification of cannulation damage in vascular access grafts based on clinical, ultrasound, and microscopic observations. **J Vasc Access**. 2024 Apr 28;11297298241248263. doi: 10.1177/11297298241248263.
3. Welsh JA, **V. Huber** in **MISEV Consortium**; Théry C, Witwer KW. Minimal information for studies of extracellular vesicles (MISEV2023): From basic to advanced approaches. **J Extracell Vesicles**. 2024;13:e12404. doi: 10.1002/jev2.12404.
4. Paolino G, Buratta S, Mercuri SR, Pellegrino RM, Urbanelli L, Emiliani C, Bertuccini L, Iosi F, **Huber V**, Brianti P, Prezioso C, Di Nicola MR, Federici C, Lugini L. Lipidic Profile Changes in Exosomes and Microvesicles Derived From Plasma of Monoclonal Antibody-Treated Psoriatic Patients. *Front Cell Dev Biol*. 2022;10:923769. doi: 10.3389/fcell.2022.923769.
5. **Huber V**, Vallacchi V, Daveri E, Vergani E. 3D models for melanoma $\gamma\delta$ T cell-based immunotherapy. *Clin Transl Med*. 2022;12:e926. doi: 10.1002/ctm2.926.
6. Rodolfo M, **Huber V**, Cossa M, Gallino G, Leone BE, Vallacchi V, Rivoltini L, Vergani E. 3D tumor explant as a novel platform to investigate therapeutic pathways and predictive biomarkers in cancer patients. **Front Immunol**. 2022;13:1068091. doi: 10.3389/fimmu.2022.1068091.
7. Fortunato O*, **Huber V***, Segale M, Cova A, Vallacchi V, Squarcina P, Rivoltini L, Suatoni P, Sozzi G, Pastorino U, Boeri M. Development of a Molecular Blood-Based Immune Signature Classifier as Biomarker for Risks Assessment in Lung Cancer Screening. *Cancer Epidemiol Biomarkers Prev*. 2022;31:2020-2029. doi: 10.1158/1055-9965.EPI-22-0689. ***Co-first author**

8. Vernieri C, Fucà G, Ligorio F, **Huber V**, ..., Frati P, Mall R, Corsetto PA, Rizzo AM, Ferraris C, Folli S, Garassino MC, Capri G, Bianchi G, Colombo MP, Minucci S, Foiani M, Longo VD, Apolone G, Torri V, Prunerì G, Bedognetti D, Rivoltini L, de Braud F. Fasting-Mimicking Diet Is Safe and Reshapes Metabolism and Antitumor Immunity in Patients with Cancer. **Cancer Discov**. 2022;12:90-107.
9. Vergani E, Daveri E, Vallacchi V, Bergamaschi L, Lalli L, Castelli C, Rodolfo M, Rivoltini L, **Huber V**. Extracellular vesicles in anti-tumor immunity. **Semin Cancer Biol**. 2021;S1044-579X(21)00228-5.
10. Paolino G, **Huber V***, Camerini S, Casella M, Macone A, Bertuccini L, Iosi F, Moliterni E, Cecchetti S, Ruspantini I, Chiarotti F, Vergani E, Lalli L, Raggi C, Di Biase A, Calvieri S, Mercuri SR, Lugini L, Federici C. The Fatty Acid and Protein Profiles of Circulating CD81-Positive Small Extracellular Vesicles Are Associated with Disease Stage in Melanoma Patients. **Cancers (Basel)**. 2021;13:4157. ***Co-first author**
11. **Huber V**, Di Guardo L, ..., Di Giacomo AM, Pilla L, Tazzari M, Camisaschi C, Arienti F, Castelli C, Rodolfo M, Beretta V, Di Nicola M, Maio M, Del Vecchio M, de Braud F, Mariani L, Rivoltini L. Back to simplicity: a four-marker blood cell score to quantify prognostically relevant myeloid cells in melanoma patients. **J Immunother Cancer**. 2021;9:e001167.
12. Rinchai D, Verzoni E, **Huber V**, Cova A, Squarcina P, De Cecco L, de Braud F, Ratta R, Dugo M, Lalli L, Vallacchi V, Rodolfo M, Roelands J, Castelli C, Chaussabel D, Procopio G, Bedognetti D, Rivoltini L. Integrated transcriptional-phenotypic analysis captures systemic immunomodulation following antiangiogenic therapy in renal cell carcinoma patients. **Clin Transl Med**. 2021;11:e434.
13. Zanetti-Domingues LC, Bonner SE, Iyer RS, Martin-Fernandez ML, **Huber V**. Cooperation and Interplay between EGFR Signalling and Extracellular Vesicle Biogenesis in Cancer. **Cells**. 2020;9:2639.
14. Zanetti-Domingues LC, Bonner SE, Martin-Fernandez ML, **Huber V**. Mechanisms of Action of EGFR Tyrosine Kinase Receptor Incorporated in Extracellular Vesicles. **Cells**. 2020;9:2505.
15. Vergani E, Dugo M, Cossa M, Frigerio S, Di Guardo L, Gallino G, Mattavelli I, Vergani B, Lalli L, Tamborini E, Valeri B, Gargiuli C, Shahaj E, Ferrarini M, Ferrero E, Gomez Lira M, **Huber V**, Vecchio MD, Sensi M, Leone BE, Santinami M, Rivoltini L, Rodolfo M, Vallacchi V. miR-146a-5p impairs melanoma resistance to kinase inhibitors by targeting COX2 and regulating NFkB-mediated inflammatory mediators. **Cell Commun Signal**. 2020;18:156.
16. Daveri E, Vergani E, Shahaj E, Bergamaschi L, La Magra S, Dosi M, Castelli C, Rodolfo M, Rivoltini L, Vallacchi V, **Huber V**. microRNAs Shape Myeloid Cell-Mediated Resistance to Cancer Immunotherapy. **Front Immunol**. 2020;11:1214.
17. Federici C, Shahaj E, Cecchetti S, Camerini S, Casella M, Iessi E, Camisaschi C, Paolino G, Calvieri S, Ferro S, Cova A, Squarcina P, Bertuccini L, Iosi F, **Huber V***, Lugini L. Natural Killer-derived extracellular vesicles: immune sensors and interactors. **Front Immunol**. 2020 Mar 13;11:262. doi: 10.3389/fimmu.2020.00262. eCollection 2020. ***co-last author**
18. Barricelli BR, Casiraghi E, Gliozzo J, **Huber V**, Leone BE, Rizzi A, Vergani B. ki67 nuclei detection and ki67-index estimation: a novel automatic approach based on human vision modeling. **BMC Bioinformatics**. 2019;20:733.
19. Rivoltini L, Vernieri C, **Huber V**. The AURORA of a New Way to Value Myeloid Immunosuppression in Cancer. **Cancer Res**. 2019;79:3169-3171. **Last author**
20. Tuccitto A, Shahaj E, Vergani E, Ferro S, **Huber V**, Rodolfo M, Castelli C, Rivoltini L, Vallacchi V. Immunosuppressive circuits in tumor microenvironment and their influence on cancer treatment efficacy. **Virchows Arch**. 2019;474:407-420.
21. Lo Russo G, Moro M, Sommariva M, Cancila V, Boeri M, Centonze G, Ferro S, Ganzinelli M, Gasparini P, **Huber V**, Milione M, Porcu L, Proto C, Prunerì G, Signorelli D, Sangaletti S, Sfondrini L, Storti C, Tassi E, Bardelli A, Marsoni S, Torri V, Tripodo C, Colombo MP, Anichini A, Rivoltini L, Balsari A, Sozzi G, Garassino MC. Antibody-Fc/FcR Interaction on Macrophages as a Mechanism for Hyperprogressive Disease in Non-small Cell Lung Cancer Subsequent to PD-1/PD-L1 Blockade. **Clin Cancer Res**. 2019;25:989-999.
22. Fortunato O, Borzi C, Milione M, Centonze G, Conte D, Boeri M, Verri C, Moro M, Facchinetti F, Andriani F, Roz L, Caleca L, **Huber V**, Cova A, Camisaschi C, Castelli C, Cancila V, Tripodo C, Pastorino U, Sozzi G. Circulating mir-320a promotes immunosuppressive macrophages M2 phenotype associated with lung cancer risk. **Int J Cancer**. 2019;144:2746-2761.
23. Casiraghi E, **Huber V**, Frasca M, Cossa M, Tozzi M, Rivoltini L, Leone BE, Villa A, Vergani B. A novel computational method for automatic segmentation, quantification and comparative analysis of immunohistochemically labeled tissue sections. **BMC Bioinformatics**. 2018;19(Suppl 10):357.
24. **Huber V**, Vallacchi V, Fleming V, Hu X, Cova A, Dugo M, Shahaj E, Sulsenti R, Vergani E, Filipazzi P, De Laurentiis A, Lalli L, Di Guardo L, Patuzzo R, Vergani B, Casiraghi E, Cossa M, Gualeni A, Bollati V, Arienti F, De Braud F, Mariani L, Villa A, Altevogt P, Umansky V, Rodolfo M, Rivoltini L. Tumor-derived microRNAs induce myeloid suppressor cells and predict immunotherapy resistance in melanoma. **J Clin Invest**. 2018;128:5505-5516. **First author**
25. Ferro S, **Huber V**, Rivoltini L. Mechanisms of tumor immunotherapy, with a focus on thoracic cancers. **J Thorac Dis**. 2018;10:4619-4631
26. Théry C, ..., **Huber V**, ... Minimal information for studies of extracellular vesicles 2018 (MISEV2018): a position statement of the International Society for Extracellular Vesicles and update of the MISEV2014 guidelines. **J Extracell Vesicles**. 2018;7:1535750.
27. Vernieri C, Mennitto A, Prisciandaro M, **Huber V**, Milano M, Rinaldi L, Cona MS, Maggi C, Ferrari B, Manoukian S, Mariani G, Bianchi G, Capri G, Rivoltini L, de Braud F. The neutrophil-to-lymphocyte and platelet-to-lymphocyte ratios predict efficacy of platinum-based chemotherapy in patients with metastatic triple negative breast cancer. **Sci Rep**. 2018;8:8703.
28. Kuchuk O*, Tuccitto A*, Citterio D*, **Huber V**, Camisaschi C, Milione M, Vergani B, Villa A, Alison M, Carradori S, Supuran C, Castelli C pH regulators to target tumor immune microenvironment in human hepatocellular carcinoma. (*co-authors). **Oncoimmunology**. 2018;7:e1445452.
29. Casiraghi E, Cossa M, **Huber V**, Rivoltini L, Tozzi M, Villa A, Vergani B. MIAQuant, a novel system for automatic segmentation, measurement, and localization comparison of different biomarkers from serialized histological slices. **Eur J Histochem**. 2017;61:2838.
30. **Huber V**, Camisaschi C, Berzi A, Ferro S, Lugini L, Triulzi T, Tuccitto A, Tagliabue E, Castelli C, Rivoltini L. Cancer acidity: An ultimate frontier of tumor immune escape and a novel target of immunomodulation. **Semin Cancer Biol**. 2017;43:74-89. **First author and corresponding author**
31. Vallacchi V, Camisaschi C, Dugo M, Vergani E, Deho P, Gualeni A, **Huber V**, Gloghini A, Maurichi A, Santinami M, Sensi M, Castelli C, Rivoltini L, Rodolfo M. microRNA Expression in Sentinel Nodes from Progressing Melanoma Patients Identifies Networks Associated with Dysfunctional Immune Response. **Genes (Basel)**. 2016;7(12). pii: E124.
32. Ascierto PA, Agarwala S, Bifulco C, Botti G, Cesano A, Ciliberto G, Davies MA, Demaria S, Dummer R, Eggermont AM, Ferrone S, Formenti S, Fu Y, Gajewski TF, Garbe C, **Huber V**, Khleif S, Krauthammer M, Lo R, Masucci G, Palmieri G, Postow M, Puzanov I, Silk AW, Spranger S, Stronck D, Tarhini A, Taube J, Testori A, Wang E, Wargo JA, Yee C, Zarour HM, Zitvogel L, Fox BA, Mozzillo

- N, Marincola F, Thurin M. Future Perspectives in Melanoma Research. Meeting report from the "Melanoma Bridge". Napoli, December 1st-4th 2015". **J Transl Med.** 2016;14:313.
33. Camisaschi C, Vallacchi V, Vergani E, Tazzari M, Ferro S, Tuccitto A, Kuchuk O, Shahaj E, Sul senti R, Castelli C, Rodolfo M, Rivoltini L, **Huber V**. Targeting immune regulatory networks to counteract immune suppression in cancer. **Vaccines (Basel).** 2016;4(4). pii: E38. **Last author and corresponding author**
 34. Bossi P, Bergamini C, Miceli R, Cova A, Orlandi E, Resteghini C, Locati L, Alfieri S, Imbimbo M, Granata R, Mariani L, Iacovelli NA, **Huber V**, Cavallo A, Licitra L, Rivoltini L. Salivary Cytokine Levels and Oral Mucositis in Head and Neck Cancer Patients Treated With Chemotherapy and Radiation Therapy. **Int J Radiat Oncol Biol Phys.** 2016;96:959-966.
 35. Rivoltini L, Chiodoni C, Squarcina P, Tortoreto M, Villa A, Vergani B, Bürdek M, Botti L, Arioli I, Cova A, Mauri G, Vergani E, Bianchi B, Della Mina P, Cantone L, Bollati V, Zaffaroni N, Gianni AM, Colombo C, **Huber V**. TRAIL-armed exosomes deliver pro-apoptotic signals to tumor site. **Clin Cancer Res.** 2016;22:3499-512. **Last author and corresponding author**
 36. Tazzari M, Negri T, Rini F, Vergani B, **Huber V**, Villa A, Dagrada P, Colombo C, Fiore M, Gronchi A, Stacchiotti S, Casali PG, Pilotti S, Rivoltini L, Castelli C. Adaptive immune contexture at the tumour site and downmodulation of circulating myeloid-derived suppressor cells in the response of solitary fibrous tumour patients to anti-angiogenic therapy. **Br J Cancer.** 2014;111:1350-62.
 37. Lugini L, Cecchetti S, **Huber V**, Luciani F, Macchia G, Spadaro F, Paris L, Abalsamo L, Colone M, Molinari A, Podo F, Rivoltini L, Ramoni C, Fais S. Immune surveillance properties of human NK cell-derived exosomes. **J Immunol.** 2012;189:2833-42.
 38. Calcinotto A, Filipazzi P, Gironi M, Iero M, De Milito A, Ricupito A, Cova A, Canese R, Jachetti E, Rossetti M, **Huber V**, Parmiani G, Generoso L, Santinami M, Borghi M, Fais S, Bellone M, Rivoltini L. Modulation of microenvironment acidity reverses anergy in human and murine tumor-infiltrating T lymphocytes. **Cancer Res.** 2012;72:2746-56.
 39. Filipazzi P, Bürdek M, Villa A, Rivoltini L, **Huber V**. Recent advances on the role of tumor exosomes in immunosuppression and disease progression. **Semin Cancer Biol.** 2012;22:342-9. **Last author**
 40. Filipazzi P, **Huber V**, Rivoltini L. Phenotype, function and clinical implications of myeloid-derived suppressor cells in cancer patients. **Cancer Immunol Immunother.** 2012;61:255-63.
 41. Ciravolo V, **Huber V**, Ghedini GC, Venturelli E, Bianchi F, Campiglio M, Morelli D, Villa A, Della Mina P, Menard S, Filipazzi P, Rivoltini L, Tagliabue E, Pupa SM. Potential role of HER2-overexpressing exosomes in countering trastuzumab-based therapy. **J Cell Physiol.** 2012;227:658-67. **First co-author**
 42. Da Riva L, Bozzi F, Mondellini P, Miccichè F, Fumagalli E, Vaghi E, Tarantino E, **Huber V**, Gronchi A, Tamborini E, Pierotti MA, Pilotti S, Bongarzone I. Proteomic detection of a large amount of SCGFα in the stroma of GISTs after imatinib therapy. **J Transl Med.** 2011;9:158
 43. Logozzi M, De Milito A, Lugini L, Borghi M, Calabrò L, Spada M, Perdicchio M, Marino ML, Federici C, Iessi E, Brambilla D, Venturi G, Lozupone F, Santinami M, **Huber V**, Maio M, Rivoltini L, Fais S. High levels of exosomes expressing CD63 and caveolin-1 in plasma of melanoma patients. **PLoS ONE.** 2009;4(4):e5219
 44. **Huber V**, De Milito A, Harguindey S, Reshkin SJ, Wahl ML, Rauch C, Chiesi A, Pouyssegur J, Gatenby RA, Rivoltini L, Fais S. Proton dynamics in cancer. **J Transl Med.** 2010;8:57 **First author**
 45. Iero M, Valenti R, **Huber V**, Filipazzi P, Parmiani G, Fais S, Rivoltini L. Tumour-released exosomes and their implications in cancer immunity. **Cell Death Differ.** 2008;15:80-8
 46. **Huber V**, Filipazzi P, Iero M, Fais S, Rivoltini L. More insights into the immunosuppressive potential of tumor exosomes. **J Transl Med** 2008;6:63. **First author**
 47. **Huber V**, Iero M, Filipazzi P, Parmiani G, Rivoltini L. The immune system: an ally in TRAIL-based cancer therapy? **Eletter, J Clin Invest.** 17.07.2008. **First author**
 48. Filipazzi P, Castelli C, Valenti R, **Huber V**, Iero M, Pilla L, Parmiani G, Rivoltini L. Transforming growth factor beta signaling and regulatory T cells. **Correspondence Re. J Clin Oncol** 2007;10:4696- 9.
 49. Filipazzi P, Valenti R, **Huber V**, Pilla L, Canese P, Iero M, Castelli C, Mariani L, Parmiani G, Rivoltini L. Identification of a new subset of myeloid suppressor cells in peripheral blood of melanoma patients and modulation by a GM-CSF-based anti-tumor vaccine. **J Clin Oncol** 2007;25:2546-53.
 50. Valenti R, **Huber V**, Iero Manuela, Filipazzi P, Parmiani G, Rivoltini L. Tumor-released microvesicles as vehicle of immunosuppression. **Cancer Res** 2007;67:2912-5
 51. Valenti R, **Huber V**, Filipazzi P, Pilla L, Sovena G, Villa A, Corbelli A, Fais S, Parmiani G, Rivoltini L. Human tumor-released microvesicles promote the differentiation of myeloid cells with transforming growth factor-beta-mediated suppressive activity on T lymphocytes. **Cancer Res** 2006;66:9290-8
 52. Cassatella M, **Huber V**, Calzetti F, Margotto D, Tamassia N, Peri G, Mantovani A, Rivoltini L, Tecchio C. Interferon-activated neutrophils store a TNF-related apoptosis-inducing ligand (TRAIL/APO-2 ligand) intracellular pool that is readily mobilizable following exposure to proinflammatory mediators. **J Leukoc Biol** 2006;79:123-32
 53. **Huber V**, Fais S, Iero M, Lugini L, Canese P, Squarcina P, Zaccheddu A, Colone M, Arancia G, Gentile M, Seregini E, Valenti R, Ballabio G, Belli F, Leo E, Parmiani G, Rivoltini L. Human colorectal cancer cells induce T-cell death through release of proapoptotic microvesicles: role in immune escape. **Gastroenterology** 2005;128:1796-804. **First author**
 54. Rivoltini L, Canese P, **Huber V**, Iero M, Pilla L, Valenti R, Fais S, Lozupone F, Casati C, Castelli C, Parmiani G. Escape strategies and reasons for failure in the interaction between tumour cells and the immune system: how can we tilt the balance towards immune-mediated cancer control? **Expert Opin Biol Ther** 2005;5:463-76
 55. Pilla L, Squarcina P, Coppa J, Mazzaferro V, **Huber V**, Pende D, Maccalli C, Sovena G, Mariani L, Castelli C, Parmiani G, Rivoltini L. Natural killer and NK-Like T cell activation in colorectal carcinoma patients treated with autologous tumor-derived heat shock protein 96. **Cancer Res** 2005;65:3942-9
 56. Tosi D, Valenti R, Cova A, Sovena G, **Huber V**, Pilla L, Arienti F, Belardelli F, Parmiani G, Rivoltini L. Role of cross-talk between IFN-α-induced monocyte-derived dendritic cells and NK cells in priming CD8+ T cell responses against human tumor antigens. **J Immunol** 2004;172:5363-7
 57. Tecchio C, **Huber V**, Scapini P, Calzetti F, Margotto D, Todeschini G, Pilla L, Martinelli G, Pizzolo G, Rivoltini L, Cassatella MA. IFN α-stimulated neutrophils and monocytes release a soluble form of TNF-related apoptosis-inducing ligand (TRAIL/Apo-2 ligand) displaying apoptotic activity on leukemic cells. **Blood** 2004;103:3837-44

58. Rivoltini L, Castelli C, Carrabba M, Mazzaferro V, Pilla L, **Huber V**, Coppa J, Gallino G, Scheibenbogen C, Squarcina P, Cova A, Camerini R, Lewis JJ, Srivastava PK, Parmiani G. Human tumor-derived heat shock protein 96 mediates in vitro activation and in vivo expansion of melanoma- and colon carcinoma-specific T cells. **J Immunol** 2003;171:3467-74
59. Rivoltini L, Carrabba M, **Huber V**, Castelli C, Novellino L, Dalerba P, Mortarini R, Arancia G, Anichini A, Fais S, Parmiani G. Immunity to cancer: attack and escape in T lymphocyte-tumor cell interaction. **Immunol Rev** 2002;188:97-113.
60. Andreola G, Rivoltini L, Castelli C, **Huber V**, Perego P, Deho P, Squarcina P, Accornero P, Lozupone F, Lugini L, Stringaro A, Molinari A, Arancia G, Gentile M, Parmiani G, Fais S. Induction of Lymphocyte apoptosis by tumor cell secretion of FasL-bearing microvesicles. **J Exp Med** 2002;195:1303-16
61. Konturek JW, Fischer H, Konturek PC, **Huber V**, Boknik P, Luess H, Neumann J, Brzozowski T, Schmitz W, Hahn EG, Domschke W, Konturek SJ. Heat shock protein 70 (HSP70) in gastric adaptation to aspirin in *Helicobacter pylori* infection. **Journal Physiol Pharmacol** 2001;52:153-64
62. Fischer H, **Huber V**, Boknik P, Luess H, Neumann J, Schmitz W, Domschke W, Konturek JW. Effect of *Helicobacter pylori* eradication on cyclooxygenase 2 (COX-2) and inducible nitric oxide (iNOS) expression during gastric adaptation to aspirin (ASA) in humans. **Microscopy Research and Technique** 2001;53:336-342
63. Fischer H, Becker JC, Boknik P, **Huber V**, Lüss H, Neumann J, Schmitz W, Domschke W, Stachura J, Konturek JW. Expression of endothelial cell-derived nitric oxide synthase (eNOS) is increased during gastric adaptation to aspirin in humans. **Alimentary Pharmacology Therapeutics** 1999;13:507-514
64. Fischer H, Becker JC, Boknik P, **Huber V**, Luess H, Neumann J, Schmitz W, Domschke W, Stachura J, Konturek JW. Expression of constitutive nitric oxide synthase in rat and gastrointestinal tract. **Biochimica et Biophysica Acta** 1999;1450:414-422.