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Decreto Rettore Sapienza Università di Roma n. 151/2018 del 17/01/2018

ELISABETTA FERRETTI
Curriculum Vitae ai fini della pubblicazione

Rome, Italy
14/02/2018

Part I – General Information

Full Name	Elisabetta Ferretti
Spoken Languages	Italian, English

Part II – Education

Type	Year	Institution	Notes (Degree, Experience,...)
University graduation	1991	Sapienza University of Rome, Italy	Medical Doctor Degree, 110/110 cum laude
Specialty	1996	Sapienza University of Rome, Italy	Specialization in Endocrinology (70/70 cum laude)
PhD	2001	University of L'Aquila, Italy	PhD degree in Experimental Medicine cum laude
Medical License	1992	Medical Register of Rome	Registration at the Medical Register Nr. 43902. 07/05/1992
National Scientific Qualification	2014	Italian Ministry of Education, University and Research	Awarded the National Scientific Qualification for Full Professor for the SC 06/A2, SSD MED/04 of the Call 2012, validity: 08/01/2014 - 08/01/2020
National Scientific Qualification	2014	Italian Ministry of Education, University and Research	Awarded the National Scientific Qualification for Full Professor for the SC 06/N1 of the Call 2012, validity: 09/06/2014 - 09/06/2020

Part III – Appointments

IIIA – Academic Appointments

Start	End	Institution	Position
2011	present	Department of Experimental Medicine, Sapienza University of	Director of Oncogenomic Unit

		Rome, Italy	
2006	present	Department of Experimental Medicine, Sapienza University of Rome, Italy	Associate Professor, SSD MED/04
2006	present	Sapienza University of Rome, Italy	Faculty member of PhD Program in Molecular Medicine
2003	2006	Department of Experimental Medicine, Sapienza University of Rome, Italy	Assistant Professor
2002	2003	Department of Experimental Medicine, University of L'Aquila, Italy	Postdoctoral Researcher
1994	1995	Department of Medical Sciences University of Milan, Italy	Visiting Resident Fellow

IIIB – Other Appointments

Start	End	Institution	Position
2016	present	Faculty of Medicine and Dentistry, Sapienza University of Rome	Member of Research Committee
2014	present	Italian Ministry of Education, University and Research	Member of Expert Peer Reviewers for Italian Scientific Evaluation (REPRISE)
2011	present	Italian Ministry of Education, University and Research	Member of the Research Quality Evaluation (VQR) Committee of the Italian Ministry of University and Research
2007	present	Department of Experimental Medicine, Sapienza University of Rome, Italy	Coordinator of national and international research Projects (see Part VI - Funding Information)
2001	2002	Regina Elena National Cancer Institute	Medical assistant

Part IV – Teaching experience

Year	Institution	Lecture/Course
2014-present	Sapienza University of Rome, Italy	Semester coordinator of General Pathology and Pathophysiology, Master Degree, Course A, Medical School
2014-present	Sapienza University of Rome, Italy	Professor of General Pathology and Pathophysiology, Master Degree, Course F, Medical School
2011-present	Sapienza University of Rome, Italy	Professor of Clinical Nursing in Specialistic area: Endocrinology and Oncology, Degree of Science of Nursing, Course I
2010-present	Sapienza University of Rome, Italy	Professor of General Pathology and Physiopathology, Degree of Science of Nursing, Course J
2008-present	Sapienza University of Rome, Italy	Professor of Molecular and Cellular Pathology

		at Master Degree of Medical Biotechnology
2007-present	Sapienza University of Rome, Italy	Professor of General Pathology and Pathophysiology, Master Degree, Course A, Medical School
2006-present	Sapienza University of Rome, Italy	Coordinator and Professor of General Pathology, Degree of Physiotherapy

Part V - Society memberships, Awards and Honors

Year	Title
2016-present	Research consultant at IRCCS Neuromed, Pozzilli (IS), Italy
2014-present	Member of Accademia Medica di Roma
2013-present	Member of the Top Italian Scientists list from Via-Academy (http://www.topitalianscientists.org/top_italian_scientists.aspx)
2011-present	Member of Molecular Oncology Group "Alberto Gulino"
2007-present	Member of the Executive Board of the Research Foundation "Umberto Di Mario" ONLUS
2007-2013	Member of the Research Project Review Committee of the Italian Ministry of University and Research
2000	Selected Scientific Articles Award, Year Book of Endocrinology, for Jaffrain-Rea ML., Ferretti E, et al. "p16 gene polymorphism and methylation" Clinical Endocrinology 1999
2000	Selected Scientific Articles Award, Year Book of Endocrinology, for Ferretti E, et al. "Evaluation of the adequacy of Levothyroxine." JCEM 1999
1997	Travel Grant Award at Endocrine Society Minneapolis meeting

International Scientific Boards

Year	Title
2017-present	International Scientific Board Member as Assistant editor of the International Journal of Molecular Sciences
2016-present	International Scientific Board Member as Assistant editor of the Cellular and Molecular Medicine Research Journal
2014-present	International Scientific Board Member of the European SIOP-LGG preclinical working group (International Society of Pediatric Oncology)
2012-present	International Scientific Board Member as Evaluator for the "Research within Priority Sectors Programme - RO14". The Programme, as part of the EEA Financial Mechanism, finances Joint Research Projects (JRPs) undertaken by researchers from Romania and EFTA States: Norway, Iceland and Liechtenstein
2006- present	International Scientific Board Member as Referee of International Scientific Journals (Science Translational Medicine, Nutrition Metabolism and Cardiovascular Diseases, Oncogene, Embo J, Cancer Research, Neuro-Oncology, Plos One, Hormone Research, Clinical Chemistry, European Journal of Endocrinology, Proceedings of the National Academy of Sciences USA, Nature Cell Biology, International Journal of Molecular Sciences, Scientific Reports, Molecular Cancer, Tumor Biology, Molecular BioSystems, BMC Cancer, Pediatric Blood & Cancer, In Vitro Cellular & Developmental Biology, Molecular Oncology, Cellular Physiology and Biochemistry, Cell Biology International, Nanomedicine, Cell Biology and Toxicology, Current

Part VI - Funding Information [grants as PI-principal investigator or I-investigator]

Year	Title	Program	Grant value
2017	Circulating microRNAs and DNA (cfDNA) as novel biomarkers for diagnostic, prognostic and therapeutic use in Medullary Thyroid Carcinoma	Agenzia Italiana del Farmaco (AIFA) Call AIFA 2016. Proposal code: TRS-2016-00001141, Duration: 3 years, PI: Ferretti Elisabetta	983.497,87 €
2016	Role of LncRNAs in brain tumors	Sapienza University Research Grants, Duration: 1 year, PI: Ferretti Elisabetta	32.000,00 €
2015	Meccanorecettori per la gravità e loro signaling	Agenzia Spaziale Italiana (ASI) Bando biomedicina e biotecnologie in ambito Spaziale -2012. Protocollo n. 0008099 del 21-09-2015, Duration: 2 years, I: Ferretti Elisabetta	58.705,75 €
2014	Non communicable diseases in the elderly: Circulating microRNAs and long non coding RNAs as novel biomarkers of response to therapy in metabolic diseases	Fondazione Roma Call 2013, Duration: 2 years, PI: Ferretti Elisabetta	396.000,00 €
2013	Defining the microRNA profile of medulloblastoma stem cells using next-generation sequencing approach	Sapienza University Research Grants, Duration: 1 year, PI: Ferretti Elisabetta	7.000,00 €
2012	Approccio integrato computazionale e sperimentale per lo studio di patologie umane.	Ministry for Instruction, University and Research (MIUR) PRIN 2010-11, Duration: 3 years, I: Ferretti Elisabetta	165.714,00 €
2012	Sviluppo di nuove strategie terapeutiche antitumorali basate su indagini di proteomica delle vie di trasduzione del segnale rilevanti nelle cellule staminali tumorali	Ministry for Instruction, University and Research (MIUR) FIRB. Project number RBAP11WCRZ, Duration: 3 years, I: Ferretti Elisabetta	392.573,00 €
2011	Analysis of microRNAs and oncogenic signalling interactions.	Sapienza University Research Grants FARI, Duration: 2 years, PI: Ferretti Elisabetta	6.500,00 €
2011	Development of effective cancer therapies based on functional proteomics and cancer stem cell	Associazione Italiana per la Ricerca sul Cancro Special Program Molecular Clinical	476.900,00 €

	targeting	Oncology 5 per mille 2010 (AIRC5xMille). Project number 9979, Duration: 5 years, I: Ferretti Elisabetta	
2010	Tumori cerebrali: studio in vivo delle cellule staminali tumorali e dell'efficacia di nuovi farmaci molecolari	Sapienza University Research Grants, Duration: 2 years, PI: Ferretti Elisabetta	50.000,00 €
2009	Hedgehog-Gli signalling and its pharmacological modulation for regenerative medicine- HEALING	European Community project FP7, contract n° PITN-GA-2009-238186, PI A. Gulino, Duration: 4 years, I: Ferretti Elisabetta	646.800,00€
2009	Ruolo del signaling di Hedgehog e dei microRNA nelle cellule staminali neuronali	Sapienza University Research Grants, Duration: 2 years, PI: Ferretti Elisabetta	2.400,00 €
2008	Identificazione e caratterizzazione delle cellule staminali in diversi tessuti endocrini e neuronali	Sapienza University Research Grants, Duration: 2 years, PI: Ferretti Elisabetta	10.000,00 €
2007	Analisi dei profili di espressione dei microRNA nel medulloblastoma	Sapienza University Research Grants, Duration: 2 years, PI: Ferretti Elisabetta	4.800,00 €
2007	Analisi dei profili di espressione dei microRNA e loro ruolo nella regolazione del segnale di Hedgehog nel medulloblastoma umano	Ministry for Instruction, University and Research (MIUR) PRIN, Duration: 2 years, I: Ferretti Elisabetta	45.500,00 €

Part VII – Research Activities

Keywords	Brief Description
Molecular oncology	Characterization of the molecular events involved in tumorigenesis mainly focusing on solid tumors and dysregulated pathways controlling progenitor cell development
Hedgehog/Gli signaling pathway	Analysis of dysregulated mechanisms of the Hedgehog/Gli signaling pathway involved in neoplastic diseases
Stem cells and Cancer stem cells	Isolation and cryopreservation of primary cancer cells including stem cells
Oncosuppressor and oncogenes	Identification of novel molecules as oncosuppressor or oncogenes and investigation of their biological function <i>in vitro</i> and <i>in vivo</i>
microRNA and Epigenetic regulation	Identification of epigenetic networks including microRNAs and long non-coding RNAs in tumors
Gene expression	Development of approaches for large-scale analysis of gene expression and pathway analysis
Circulating biomarkers	Analysis and discovery of circulating biomarkers (e.g. microRNAs and cfDNA) in cancer
Therapeutic targets	Identification of new molecular markers of diseases susceptible to become therapeutic targets in tumors

Proteomics	Proteomic analysis with particular interest in post-translation modifications of proteins, such as phosphorylation and acetylation
Mouse models	Development of mouse models for the study of solid tumors
Metabolic diseases	Obesity and diabetes mellitus
Tumors	Medulloblastoma, neuroblastoma, gliomas, lung, colorectal and thyroid cancers

Part VIII – Summary of Scientific Achievements

Product type	Number	Data Base	Start	End
Papers [international]	101	PubMed, Scopus	1996	present
Papers [national]	-	-	-	-
Books [scientific]	15	Google Scholar	1996	present
Books [teaching]	15	Google Scholar	1996	present

Total Impact factor	511.176 (IF relative to the publication year, from InCites Journal Citation Reports)
Average Impact factor per Product	5.06 (IF relative to the publication year, from InCites Journal Citation Reports)
Total Citations	4452 (Scopus)
Average Citations per Product	44.07 (Scopus)
Hirsch (H) index	38 (Scopus)
Number of publications as first or last author in Journals with impact factor>1	26
Number of publications as first, last or corresponding author in Journals with impact factor>5	17
Normalized H index*	1.8095

*H index divided by the academic seniority.

Part IX– Selected Publications

List of the publications selected for the evaluation. For each publication report title, authors, reference data, journal IF (if applicable), citations, press/media release (if any).

List of 16 publications selected for the evaluation in the last 10 years

Bold first author and underlined last or corresponding author

Number	Selected Publication	IF (2016)	IF (publication year)	Citations according to Scopus
1	The histone methyltransferase EZH2 as a druggable target in SHH medulloblastoma cancer stem cells. Miele E, Valente S, Alfano V, Silvano M, Mellini P, Borovika D, Marrocco B, Po A, Besharat ZM, Catanzaro G, Battaglia G, Abballe L, Zwergel C, Stazi G, Milite C, Castellano S, Tafani M, Trapencieris P, Mai A, <u>Ferretti E</u> . Oncotarget. 2017. doi: https://doi.org/10.18632/oncotarget.19782 .	5.168	5.168	0
2	β -arrestin1-mediated acetylation of Gli1 regulates Hedgehog/Gli signaling and modulates self-renewal of SHH medulloblastoma Cancer Stem Cells. Miele E, Po A, Begalli F, Antonucci L, Mastronuzzi A, Marras CE, Carai A, Cucchi D, Abballe L, Besharat ZM, Catanzaro G, Infante P, Di Marcotullio L, Canettieri G, De Smaele E, Screpanti I, Locatelli F, <u>Ferretti E</u> . BMC Cancer. 2017. doi: 10.1186/s12885-017-3477-0.	3.288	3.288	0
3	Noncanonical GLI1 signalling promotes stemness features and in-vivo growth in lung adenocarcinoma. Po A., Silvano M., Miele E., Capalbo C., Eramo A., Salvati V., Todaro M., Besharat Z.M., Catanzaro G., Cucchi D., Coni S., Di Marcotullio L., Canettieri G., Vacca A., Stassi G., De Smaele E., Tartaglia M., Screpanti I., De Maria R. and <u>Ferretti E</u> . Oncogene 2017. doi:10.1038/onc.2017.91.	7.519	7.519	1
4	The long noncoding RNA linc-NeD125 controls the expression of medulloblastoma driver genes by microRNA sponge activity. Laneve P., Po A., Favia A., Legnini I., Alfano V., Rea J., Di Carlo V., Bevilacqua V., Miele E., Mastronuzzi A., Carai A., Locatelli F., Bozzoni	5.168	5.168	1

	I., <u>Ferretti E.*</u> and Caffarelli E.* (*Share senior Authorship and co-corresponding). Oncotarget 2017. doi: 10.18632/oncotarget.16049.			
5	β -arrestin1/miR-326 transcription unit is epigenetically regulated in Neural Stem Cells where it controls stemness and growth arrest. Po A., Begalli F., Abballe L., Alfano V., Besharat Z.M., Catanzaro G., Vacca A., Napolitano M., Tafani M., Giangaspero F., Locatelli F., <u>Ferretti E.*</u> and Miele E.* (*Share senior Authorship and co-corresponding). 2017 Stem Cell International. doi: 10.1155/2017/5274171.	3.54	3.54	1
6	Albumin nanoparticles for glutathione-responsive release of cisplatin: New opportunities for medulloblastoma. Catanzaro G., Curcio M., Cirillo G., Spizzirri U.G., Besharat Z.M., Abballe L., Vacca A., Iemma F., Picci N., <u>Ferretti E.</u> Int J Pharm. 2017 Jan 30;517(1-2):168-174. doi: 10.1016/j.ijpharm.2016.12.017.	3.649	3.649	1
7	Response of recurrent BRAFV600E mutated ganglioglioma to Vemurafenib as single agent. Del Bufalo F, Carai A, Figà-Talamanca L, Pettorini B, Mallucci C, Giangaspero F, Antonelli M, Badiali M, Moi L, Bianco G, Cacchione A, Locatelli F, <u>Ferretti E*</u> , Mastronuzzi A (*corresponding). J Transl Med. 2014. Dec 19;12:356. doi: 10.1186/s12967-014-0356-1.	3.786	3.93	26
8	High-throughput microRNA profiling of pediatric high-grade gliomas. Miele E, Buttarelli FR, Arcella A, Begalli F, Garg N, Silvano M, Po A, Baldi C, Carissimo G, Antonelli M, Spinelli GP, Capalbo C, Donofrio V, Morra I, Nozza P, Gulino A, Giangaspero F, <u>Ferretti E.</u> Neuro-Oncol. 2014 Jan;16(2):228-40.	7.786	6.776	12
9	microRNA-17-92 cluster is a direct Nanog target and controls neural stem cell through Trp53inp1. Garg N, Po A, Miele E, Campese AF, Begalli F, Silvano M, Infante P, Capalbo C, De Smaele E, Canettieri G, Di Marcotullio L, Screpanti I, <u>Ferretti E*</u> , Gulino A* (*co-corresponding). EMBO J. 2013 Oct 30;32(21):2819-32.	9.792	10.748	32
10	Hedgehog controls neural stem cells through p53-independent regulation of Nanog. Po A*, Ferretti E* (* Equal contributors), Miele E, De Smaele E, Paganelli A, Canettieri G, Coni	9.792	10.124	114

	S, Di Marcotullio L, Biffoni M, Massimi L, Di Rocco C, Screpanti I, Gulino A. EMBO J. 2010 Aug 4;29(15):2646-58.			
11	Histone deacetylase and Cullin3-REN(KCTD11) ubiquitin ligase interplay regulates Hedgehog signalling through Gli acetylation. Canettieri G, Di Marcotullio L, Greco A, Coni S, Antonucci L, Infante P, Pietrosanti L, De Smaele E, Ferretti E, Miele E, Pelloni M, De Simone G, Pedone EM, Gallinari P, Giorgi A, Steinkühler C, Vitagliano L, Pedone C, Schinin ME, Screpanti I, Gulino A. Nat Cell Biol. 2010 Feb;12(2):132-42.	20.06	19.407	160
12	MicroRNA profiling in human medulloblastoma. Ferretti E , De Smaele E, Po A, Di Marcotullio L, Tosi E, Espinola MS, Di Rocco C, Riccardi R, Giangaspero F, Farcomeni A, Nofroni I, Laneve P, Gioia U, Caffarelli E, Bozzoni I, Screpanti I, Gulino A. Int J Cancer. 2009 Feb 1;124(3):568-77.	6.513	4.722	194
13	Glucocorticoids and neonatal brain injury: the Hedgehog connection. Gulino A, De Smaele E, <u>Ferretti E</u> . J Clin Invest. 2009 Feb;119(2):243-6.	12.784	15.387	12
14	Proapoptotic function of the retinoblastoma tumor suppressor protein. Ianari A, Natale T, Calo E, Ferretti E, Alesse E, Screpanti I, Haigis K, Gulino A, Lees J (2009). Cancer Cell. 2009 Mar 3;15(3):184-94.	27.407	25.288	86
15	Concerted microRNA control of Hedgehog signalling in cerebellar neuronal progenitor and tumour cells. Ferretti E , De Smaele E, Miele E, Laneve P, Po A, Pelloni M, Paganelli A, Di Marcotullio L, Caffarelli E, Screpanti I, Bozzoni I, Gulino A. EMBO J. 2008 Oct 8;27(19): 2616-27.	9.792	8.295	201
16	Notch signaling is involved in expression of thyrocyte differentiation markers and is down-regulated in thyroid tumors. Ferretti E , Tosi E, Po A, Scipioni A, Morisi R, Espinola MS, Russo D, Durante C, Schlumberger M, Screpanti I, Filetti S, Gulino A. J Clin Endocrinol Metab. 2008 Oct;93(10):4080-7.	5.455	6.325	36

Roma 14-02-2018

Autorizzo il trattamento dei dati personali contenuti nel mio curriculum vitae.