

# Corrado Tarella

## Personal Details

Place of Birth: Bricherasio (TO) - Italy

Date of Birth: January 22, 1951

Citizenship: Italian

Languages: Italian, English

## Education and PHD/Masters/Courses

Liceo Classico "Ist. Sociale", Torino – Italy, B.A. 1969, Classical Studies

School of Medicine, University of Torino – Italy, M.D. 1975, Medicine

School of Medicine, University of Milan – Italy, Certification Hematology, 1979, Post-graduate specialty in Hematology

School of Medicine, University of Torino – Italy, Certification Cl. Oncology, 1998, Post-graduate specialty in Clinical Oncology

## Titles

Director, Hemato-Oncology Division at European Institute of Oncology, Milan, Italy

Professor of Hematology, University of Torino, Italy

## Professional Positions

1981-1986 Assistant Director, Department of Medicine and Experimental Oncology, Hematology Division, S. Giovanni Hospital of Torino - Italy

1986-2000 In charge of the Bone Marrow Transplantation program, Hematology Division, S. Giovanni Hospital of Torino - Italy

2000-2008 In charge of the Lymphoma Treatment program, Hematology Division, S. Giovanni Hospital of Torino – Italy

2008-2014 Director, University Division of Hematology and Cell Therapy at the Mauriziano Hospital in Torino – Italy

2008-2014 Director, Laboratory of Experimental Hematology, at Molecular Biotechnology Center (MBC), University of Torino – Italy

1998-2002 Associate Professor of Hematology at the School of Medicine, University of Torino– Italy

2002-present Full Professor of Hematology at the School of Medicine, University of Torino – Italy

Since December 2014: Director, Hemato-Oncology Division at the European Institute of Oncology, Milan

## Awards and Other Professional Activities

1976-1978 Internship, Dep. Internal Medicine, University of Torino – Italy

1978 Award from "Gigi Ghirotti" Committee, with a grant for a 6-mos. stage abroad

1978-1980 Post-doctoral research fellow at Laboratory of Tumor Cell Biology (Director: Prof. R.C. Gallo), N.C.I., Bethesda, MD - U.S.A.

April-June 1984 Visiting physician as Associate Staff at the Bone Marrow Transplantation Program, The Johns Hopkins Oncology Center (Director: Prof. G. Santos), Baltimore, MD - U.S.A.

1998-2001 National Coordinator of the Autologous Transplantation section - GITMO (Gruppo Italiano Trapianto Midollo Osseo)

November 2002 Winner of the 10th Asti Award from "Lega Italiana Lotta contro I Tumori" and "Cassa di Risparmio di Asti"

2002-2008 Founder, together with other 12 Italian Colleagues, and then President elected of the multicenter group GITIL (Gruppo Italiano per le Terapie Innovative nei Linfomi)

2004 Founder, together with other 10 Italian and Brazilian Colleagues, of the multicenter group AIBE (Associazione Italo-Brasiliana Di Ematologia)

November 2007 Milano – Winner of the 15th National "Vittorio Alfieri" Prize – "Terapia Innovativa dei Tumori"

September 2010 GITIL joined other Italian multicenter groups in the creation of the Fondazione-ONLUS FIL (Fondazione Italiana Linfomi)

December 2010 appointment as member elected of the Torino Academy of Medical Science  
Since 1983: he has been acting as Reviewer for National and International Scientific Institutions & Societies, including: MIUR (Italian Ministry of University & Research) – HRB (Health Research Board, Ireland) – Regione Piemonte – ASH, EHA, SIE, SIES and for International Scientific Journals, including Ann Hematol, Bone Marrow Transpl, Biol BMT, Blood, Cancer, Cancer Res, Exp Hematol, J Clin Oncol, Lancet Oncol, Leuk Lymph, Nature Clin Pr Oncol, Neurology, Plos One

### **Main research grants and financial supports during the last four years**

1. Italian Association Cancer Research (AIRC) MCO-9998 - Project: Cell therapy with TRAIL-armed, genetically engineered or phenotypically redirected, effectors. Group Leader of the Sub-project: Alternative vehicles for mTRAIL delivery and TRAIL-R2 targeting. 2012-2016
2. Italian Association Cancer Research (AIRC). Investigator Grant - Project: Bone Marrow Stem Cells exposed in vivo or in vitro to chemotherapy: cell ageing and malignant transformation. Code # 10197, 2010-2013
3. Grant from the Ministry of Education, University and Research. ResearchProject on: Hematopoietic Stem Cells, Microenvironment, and Microvesicles. 2012-2013 (part of the activities of the research project are still ongoing through 2014)
4. Financial supports from Compagnia di S. Paolo di Torino and from A.I.P.E.-La Speranza (Associazione Italiana Pazienti Emopatici) – to restore and modernize the In-patient structure of the Hematology and Cell Therapy Unit at the Mauriziano Hospital in Torino (renovation completed in June 2013, at a final cost of 1.200.000 €)

### **Previous Clinical and Research Activities**

1976-1978 Internship, Dep. Internal Medicine, University of Torino – Italy  
1978 Award from "Gigi Ghirotti" Committee, with a grant for a 6-mos. stage abroad  
1978-1980 Post-doctoral research fellow at Laboratory of Tumor Cell Biology (Director: Prof. R.C. Gallo), N.C.I., Bethesda, MD - U.S.A.  
April-June 1984 Visiting physician as Associate Staff at the Bone Marrow Transplantation Program, The Johns Hopkins Oncology Center (Director: Prof. G. Santos), Baltimore, MD - U.S.A.

### **Main scientific fields of interest and achievements of Prof. C. Tarella**

- He contributed to the set up and activation of the Centro Dipartimentale di Trapianto di Midollo - Ospedale Molinette di Torino and he was the Doctor Responsible for the Bone Marrow Program of the University Division of Hematology in Torino for 15 years, between 1985 and 2000
- In collaboration with Prof. A.M. Gianni, I.N.T. Milano, he gave seminal contributions for the development and clinical use of mobilized hematopoietic stem & progenitor cells (PBSC) in the setting of HSCT transplantation
- He developed an original high-dose chemotherapy scheme with autograft for patients with Follicular Lymphoma (FL) and Mantle-cell Lymphoma (MCL), improving the prognosis and life expectancy for these lymphoma subgroups, once considered poorly manageable
- He has been able to extend the use of intensive treatments at the multicenter level, by conducting relevant clinical trials within GITMO and GITIL groups
- He always had interest for the biological research and his main fields of interest have been: i. proliferation and differentiation of hematopoietic stem and progenitor cells; ii. in vitro manipulation and separation of early hematopoietic cells; iii. detection and monitoring of minimal residual disease in lymphoproliferative malignancies; iv. analysis of cell ageing and senescence of hematopoietic cells, with particular interest in telomere length shortening; v. use of Extracellular Vesicles (EVs) as potential vectors to delivering cytotoxic drugs to cancer cells
- He has been also interested in the clinical use of hematopoietic cells for the repair and regeneration of non-hematopoietic tissues, as documented by several clinical trials performed in collaboration with other specialists, in particular with hepatologists (Prof. M. Rizzetto), neurologists (Prof. A. Chiò) and orthopaedic surgeons ( Prof. P. Ross)
- Finally, he has been always carefully involved in the clinical management of hematological patients; in this view, he favored the creation of the association of patients with hematological diseases, named AIPE-La Speranza (Associazione Italiana Pazienti Emopatici). Together with the AIPE, and with the support of the Compagnia di S. Paolo di Torino, Prof. Tarella had a main role in the building of a brand new facility for the hospitalization of hemtological patients at the Mauriziano Hospital in Torino

## Publications

Selected peer-reviewed publications (in chronological order) (out of 150 papers published on International scientific journals, with over 6.000 citations in literature)

**Tarella C**, Ferrero D, Gallo E, Pagliardi GL, Ruscetti FW. Induction of differentiation of HL-60 cells by dimethylsulfoxide: evidence for a stochastic model not linked to the cell division cycle. **Cancer Res** 1982, 42: 445-449 (I.F. 9.329) (Citations: 132)

Gianni AM, Siena S, Bregni M, **Tarella C**, Stern AC, Pileri A, Bonadonna G. Granulocyte-macrophage colony-stimulating factor to harvest circulating hemopoietic stem cells for autransplantation. **The Lancet** 1989, II: 580-585 (I.F. 45.217) (Citations: 748)

**Tarella C**, Ferrero D, Bregni M, Siena S, Gallo E, Pileri A, Gianni AM. Peripheral blood expansion of early progenitor cells after high-dose cyclophosphamide and rhGM-CSF. **Eur J Cancer** 1991, 27: 22-27 (I.F. 5.417) (Citations: 93)

**Tarella C**, Boccadoro M, Omedè P, Bondesan P, Caracciolo D, Frieri R, Bregni M, Siena S, Gianni AM, Pileri A. Role of chemotherapy and GM-CSF on hemopoietic progenitor cell mobilization in multiple myeloma. **Bone Marrow Transpl** 1993, 11: 271-277 (I.F. 3.570) (Citations: 55)

Corradini P, Astolfi M, Cherasco C, Caracciolo A, Pileri A, **Tarella C**. Molecular monitoring of minimal residual disease in follicular and mantle cell non-Hodgkin's lymphomas treated with high-dose chemotherapy and peripheral blood progenitor cell autografting. **Blood** 1997, 89: 724-731 (I.F. 10.452) (Citations: 142)

Gianni AM, Bregni M, Siena S, Brambilla, Di Nicola M, Lombardi F, Gandola F, **Tarella C**, Pileri A, Ravagnani F, Valagussa P, Bonadonna G. High-dose chemotherapy and autologous bone marrow transplantation compared with MACOP-B in aggressive B-cell lymphoma. **New Engl J Med** 1997, 336: 1290-1297 (I.F. 55.973) (Citations: 430)

Palumbo A, Triolo S, Argentino C, Bringhen S, Dominietto A, Rus C, Omedè P, **Tarella C**, Pileri A, Boccadoro M. Dose-intensive melphalan with stem cell support (MEL 100) is superior to standard treatment in elderly myeloma patients. **Blood** 1999, 94 (4): 1248-1253 (I.F. 10.452) (Citations: 143)

**Tarella C**, Caracciolo D, Corradini P, Zallio F, Ladetto M, Cuttica A, Rossi G, Novero D, Gavarotti P, Pileri A. Long-term follow-up of advanced-stage low-grade lymphoma patients treated upfront with high-dose sequential chemotherapy and autograft. **Leukemia** 2000, 14: 740-747 (I.F. 10.431) (Citations: 38)

Ladetto M, Corradini P, Vallet S, Benedetti F, Vitolo U, Martelli M, Brugiattelli M, Coser P, Perrotti A, Majolino I, Fioritoni G, Morandi S, Zambello R, Chisesi T, Di Renzo N, Musso M, Vivaldi P, De Crescenzo A, Gallamini A, Salvi F, Santini G, Astolfi M, Drandi D, Pileri A, **Tarella C**. High Rates Of Clinical And Molecular Remissions In Follicular Lymphoma Patients Receiving High-Dose Sequential Chemotherapy And Autografting At Diagnosis: A Multicenter, Prospective Study By The Gruppo Italiano Trapianto Midollo Osseo (GITMO). **Blood** 2002, 100(5): 1559-65 (I.F. 10.452) (Citations: 82)

**Tarella C**, Cuttica A, Vitolo U, Liberati M, Di Nicola M, Cortelazzo S, Rosato R, Rosanelli C, Di Renzo N, Musso M, Pavone E, Santini G, Pescarollo A, De Crescenzo A, Federico M, Gallamini A, Pregno P, Romano R, Coser P, Gallo E, Boccadoro M, Barbui T, Pileri A, Gianni AM and Levis A. High-Dose Sequential Chemotherapy And Peripheral Blood Progenitor Cell Autografting In Patients with Refractory and/or Recurrent Hodgkin Lymphoma: A Multicenter Study Of The Intergruppo Italiano Linfomi Showing Prolonged Disease-Free Survival In Patients Treated At First Recurrence. **Cancer** 2003, 97(11): 2748-2759 (I.F. 4.889) (Citations: 58)

Corradini P, Doderò A, Zallio F, Caracciolo D, Casini M<sup>□</sup>, Bregni M, Narni F, Patriarca F, Boccadoro M, Gianni AM, **Tarella C**. Graft-versus-lymphoma effect in relapsed peripheral T-cell non-Hodgkin's lymphomas after reduced-intensity conditioning followed by allogeneic transplantation of hematopoietic cells. **J Clin Oncol** 2004, 22(11): 2172-6 (I.F. 18.428) (Citations: 176)

Gaia S, Smedile A, Omedè P, Olivero A, Sanavio F, Balzala F, Ottobrelli A, Abate ML, Marzano A, Rizzetto M and **Tarella C**. Feasibility and safety of G-CSF administration to induce bone marrow-derived cell mobilization in patients with end stage liver disease. **J Hepatol** 2006, 45(1): 13-19 (**I.F. 11.336**) (**Citations: 93**)

Gallamini A, Zaja F, Patti C, Billio A, Specchia MR, Tucci A, Levis A, Manna A, Secondo V, Rigacci L, Pinto A, Iannitto E, Zoli V, Torchio P, Pileri S, **Tarella C**. Alemtuzumab (Campath-1H) and CHOP chemotherapy as first-line treatment of peripheral T-cell lymphoma: results of a GITIL (Gruppo Italiano Terapie Innovative nei Linfomi) prospective multicenter trial. **Blood** 2007, 110(7): 2316-23. (**I.F. 10.452**) (**Citations: 175**)

**Tarella C**, Zanni M, Di Nicola M, Patti C, Calvi R, Pescarollo A, Zoli V, Fornari A, Remotti D, Ponzoni M, Caracciolo D, Ladetto M, Magni M, Devizzi L, Rosato R, Boccadoro M, Bregni M, Corradini P, Gallamini A, Majolino I, Mirto S, Gianni AM, on behalf of the Gruppo Italiano Terapie Innovative nei Linfomi (GITIL). Prolonged survival in poor-risk Diffuse Large B-cell Lymphoma following front-line treatment with rituximab-supplemented, early-intensified chemotherapy with multiple autologous hematopoietic stem cell support: a multicenter study by GITIL (*Gruppo Italiano Terapie Innovative nei Linfomi*). **Leukemia** 2007, 21(8): 1802-11 (**I.F. 10.431**) (**Citations: 43**)

Ladetto M, De Marco F, Benedetti F, Vitolo U, Patti C, Rambaldi A, Pulsoni A, Musso M, Liberati AM, Olivieri A, Gallamini A, Pogliani E, Rota Scalabrini D, Callea V, Di Raimondo F, Pavone V, Tucci A, Cortelazzo S, Levis A, Boccadoro M, Majolino I, Pileri A, Gianni AM, Passera R, Corradini P, **Tarella C**. Prospective, multicenter randomized GITMO/IIL trial comparing intensive (R-HDS) versus conventional (CHOP-R) chemoimmunotherapy in high-risk follicular lymphoma at diagnosis: the superior disease control of R-HDS does not translate into an overall survival advantage. **Blood** 2008, 111(8):4004-13 (**I.F. 10.452**) (**Citations: 128**)

**Tarella C**, Zanni M, Magni M, Benedetti F, Patti C, Barbui T, Pileri A, Boccadoro M, Ciceri F, Gallamini A, Cortelazzo S, Majolino I, Mirto S, Corradini P, Passera P, Pizzolo G, Gianni AM, Rambaldi A. Rituximab improves the efficacy of high-dose chemotherapy with autograft for high-risk follicular and diffuse large B-cell lymphoma: a multicenter Gruppo Italiano Terapie Innovative nei Linfomi survey. **J Clin Oncol** 2008, 26(19): 3166-75. (**I.F.18.428**) (**Citations: 44**)

**Tarella C**, Passera R, Magni M, Benedetti F, Rossi A, Gueli A, Patti C, Parvis G, Ciceri F, Gallamini A, Cortelazzo S, Zoli V, Corradini P, Carobbio A, Mule´ A, Bosa M, Barbui A, Di Nicola M, Sorio M, Caracciolo D, Gianni AM, and Rambaldi A. Risk Factors for the Development of Secondary Malignancy After High-Dose Chemotherapy and Autograft, With or Without Rituximab: A 20-Year Retrospective Follow-Up Study in Patients With Lymphoma. **J Clin Oncol** 2011, 29: 814-24 (**I.F. 18.428**) (**Citations: 49**)

**Tarella C**, Gueli A, Ruella M, Cignetti A. Lymphocyte transformation and autoimmune disorders. **Autoimmunity Reviews** 2013, 12: 802-813 (**I.F. 7.933**) (**Citations: 6**)

Barosi G, Carella A, Lazzarino M, Marchetti M, Martelli M, Rambaldi A, **Tarella C**, Vitolo U, Zinzani PL, Tura S. Management of nodal indolent (non marginal-zone) non-Hodgkin's lymphomas: practice guidelines from the Italian Society of Hematology, Italian Society of Experimental Hematology and Italian Group for Bone Marrow Transplantation. **Haematologica** 2005; 90(9): 1236-57 (**Citations: 28**)

Buttiglieri S, Ruella M, Risso A, Spatola T, Silengo L, Avvedimento EV, **Tarella C**. The aging effect of chemotherapy on cultured human mesenchymal stem cells. *Exp Hematol* 2011; 39(12): 1171-81 (**I.F. 2.475**) (**Citations: 10**)

Olivieri A, Marchetti M, Lemoli R, **Tarella C**, Iacone A, Lanza F, Rambaldi A, Bosi A. Proposed definition of 'poor mobilizer' in lymphoma and multiple myeloma: an analytic hierarchy process by ad hoc working group Gruppo italiano Trapianto di Midollo Osseo. *Transplant. Bone Marrow Transplant* 2012, 47: 342 (**I.F. 3.570**) (**Citations: 33**)

Zinzani PL, Marchetti M, Billio A, Barosi G, Carella AM, Lazzarino M, Martelli M, Rambaldi A, Rigacci L, **Tarella C**, Vitolo U, Tura S. SIE, SIES, GITMO revised guidelines for the management of follicular lymphoma. *Am J Hematol* 2013; 88: 185-92 (**I. F. 3.798**) (**Citations: 6**)