

# **CURRICULUM VITAE**

**MADDALENA TROMBETTA**

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**Address**

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Endocrinologia, Diabetologia e Metabolismo

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**Date and place of birth**

1 September 1972, Verona (Italy)

**Current position**

Research Scientist at Department of Medicine, University of Verona Medical School, Verona, Italy

Division of Endocrinology, Diabetes and Metabolism, Department of Medicine, University Hospital of Verona, Verona, Italy

**EDUCATION:**

1997: Degree in Medicine, University of Verona, Italy

2002: Postgraduate in Endocrinology and Metabolism Diseases, University of Verona

2006: Ph.D. in Chronic-Degenerative Diseases, University of Verona

2006-2008: Post-doctoral researcher at Department of Medicine, University of Verona

2009: Research Scientist at Department of Medicine, University of Verona

2015: Coordinator of the Veneto Regional Reference Centre for “High Diabetes and Metabolism Technologies”

## **ACQUAINTED SCIENTIFIC SKILLS:**

- Knowledge of the basis technique for clinical studies on the metabolism, such as hyperinsulinemic euglycemic clamp, Intravenous Glucose Tolerance Test (IVGTT), using radioactive and nonradioactive glucose tracer, indirect calorimetry and arm perfusion technique.
- Knowledge of the ecographic technique for measuring the arterial distensibility and compliance of the human conductance arteries using an echo-tracking device in B-M mode (Wall Track System)
- Knowledge of SAAM 1.2 software program for analysing the minimal model of C-peptide secretion, measured using Oral Glucose Tolerance Test (OGTT), Intravenous Glucose Tolerance Test (IVGTT) and hyperglycemic clamp (HGC).
- Extensive knowledge of SAP (sensor augmented pump) therapy in type 1 diabetes

## **PROJECTS**

She participated to the following financed projects and some of these are still in progress:  
2003-2008: University of Pisa, Italian Society of Diabetology, Eli Lilly and Company. Title: "GENFIEV: Evaluation of Genetic, Biochemical and Clinical Determinants of Type 2 Diabetes Progression in Subjects at High Risk. "

2003: European Foundation for the Study of Diabetes, MIUR and University of Verona. Title: "The Verona Newly Diagnosed Type 2 Diabetes Study (VNDS). Construction of a Biobank of Diabetes Related Genotypes and Phenotypes"

2009: University of Verona. Title: "Comparison of Aerobic and Resistance Training Effects on Glycemic Control in Type 2 Diabetes (RAED2)"

2013: European Foundation for the Study of Diabetes and University of Verona. Title: "Meal Glucose Regulation in Type 1 Diabetes on Insulin Pump Therapy: Towards a Better Understanding of the Glucose-Insulin System".

2014: University of Padua and University of Verona. Title: "Impact of Locus of Control and Fear of Hypoglycaemia on clinical efficacy and treatment satisfaction in type 1 diabetes patient on Insulin Pump Therapy"

2017: University of Verona. Title: "Transition from pediatric to adult diabetes care system for young adults with type 1 diabetes: a register of metabolic and psychological features"

2018: University of Verona. Title: "Accuracy of CGM during different session of physical activity in type 1 diabetes patients"

## **PUBLICATIONS:**

She is author of 43 scientific publications on international journals and coauthors of the chapter “Methods to Assess In Vivo Insulin Sensitivity and Insulin Secretion” in the book *Diabetes Epidemiology, Genetics, Pathogenesis, Diagnosis, Prevention, and Treatment* (<https://doi.org/10.1007/978-3-319-45015-5>)”

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2. Indelicato L, Calvo V, Dauriz M, Negri A, Negri C, Trombetta M, Bonora E. Depressive symptoms and glycaemic control in adults with type 1 diabetes: an exploratory study on the role of family functioning. *Acta Diabetol.* 2020 Jan;57(1):23-30.
3. Dwivedi OP, Lehtovirta M, Hastoy B, Chandra V, Krentz NAJ, Kleiner S, Jain D, Richard AM, Abaitua F, Beer NL, Grotz A, Prasad RB, Hansson O, Ahlqvist E, Krus U, Artner I, Suoranta A, Gomez D, Baras A, Champon B, Payne AJ, Moralli D, Thomsen SK, Kramer P, Spiliotis I, Ramracheya R, Chabosseau P, Theodoulou A, Cheung R, van de Bunt M, Flannick J, Trombetta M, Bonora E, Wolheim CB, Sarelin L, Bonadonna RC, Rorsman P, Davies B, Brosnan J, McCarthy MI, Otonkoski T, Lagerstedt JO, Rutter GA, Gromada J, Gloyn AL, Tuomi T, Groop L. Loss of ZnT8 function protects against diabetes by enhanced insulin secretion. *Nat Genet.* 2019 Nov;51(11):1596-1606.
4. Zoppini G, Trombetta M, Sabbagh L, Dauriz M, Mantovani A, Bergamini C. Impaired Aortic Valve Growth in Type 1 Diabetes Mellitus. *Can J Cardiol.* 2019 Jul;35(7): 941.e5-941.e6
5. Grancini V, Trombetta M, Lunati ME, Boselli ML, Gatti S, Donato MF, Palmieri E, Resi V, Pugliese G, Bonadonna RC, Orsi E Central role of the  $\beta$ -cell in driving regression of diabetes after liver transplantation in cirrhotic patients. *J Hepatol.* 2019 May;70(5):954-962.
6. Zoppini G, Bergamini C, Trombetta M, Sabbagh L, Dauriz M, Mantovani A, Targher G, Fossà I, Rinaldi E, Bonora E- Increased aortic stiffness index in patients with type 1 diabetes without cardiovascular disease compared to controls. *J Endocrinol Invest.* 2019 Mar 16
7. Zusi C, Trombetta M, Bonetti S, Dauriz M, Boselli ML, Trabetti E, Malerba G, Penno G, Zoppini G, Bonora E, Solini A, Bonadonna RC A renal genetic risk score (GRS) is associated with kidney dysfunction in people with type 2 diabetes. *Diabetes Res Clin Pract.* 2018 Oct; 144:137-143.
8. Mantovani A, Teobaldi I, Stoico V, Perrone F, Zannoni M, Cima L, Bruti M, Mingolla L, Trombetta M, Bonora E- Cutaneous squamous carcinoma in a patient with diabetic foot: an unusual evolution of a frequent complication. *Endocrinol Diabetes Metab Case Rep.* 2018 Jul 31;2018
9. Zoppini G, Bergamini C, Bonapace S, Trombetta M, Mantovani A, Toffalini A, Lanzoni L, Bertolini L, Zenari L, Bonora E, Targher G, Rossi A. Left ventricular chamber dilation and filling pressure may help to categorise patients with type 2 diabetes. *BMJ Open Diabetes Res Care.* 2018 Jun 14;6(1):

10. Dauriz M, Bacchi E, Boselli L, Santi L, Negri C, Trombetta M, Bonadonna RC, Bonora E, Moghetti P. Association of free-living physical activity measures with metabolic phenotypes in type 2 diabetes at the time of diagnosis. The Verona Newly Diagnosed Type 2 Diabetes Study (VNDS). *Nutr Metab Cardiovasc Dis*. 2018 Jan 9. PubMed PMID: 29477578.
11. Lepore G, Bonfanti R, Bozzetto L, Di Blasi V, Girelli A, Grassi G, Iafusco D, Laviola L, Rabbone I, Schiaffini R, Bruttomesso D; Italian Study Group on the Diffusion of CSII. Metabolic control and complications in Italian people with diabetes treated with continuous subcutaneous insulin infusion. *Nutr Metab Cardiovasc Dis*. 2018 Apr;28(4):335-342 PubMed PMID: 29428572.
12. Cacciatori V, Zoppini G, Bellavere F, Rigolon R, Thomaseth K, Pichiri I, Trombetta M, Dauriz M, De Santi F, Targher G, Santi L, Bonora E. Long-Acting GLP-1 Receptor Agonist Exenatide Influence on the Autonomic Cardiac Sympatho-Vagal Balance. *J Endocr Soc*. 2017 Nov 6;2(1):53-62.
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14. Indelicato L, Mariano V, Galasso S, Boscari F, Cipponeri E, Negri C, Frigo A, Avogaro A, Bonora E, Trombetta M, Bruttomesso D. Influence of health locus of control and fear of hypoglycaemia on glycaemic control and treatment satisfaction in people with Type 1 diabetes on insulin pump therapy. *Diabet Med*. 2017 May;34(5):691-697.
15. Zoppini G, Bonapace S, Bergamini C, Rossi A, Trombetta M, Lanzoni L, Bertolini L, Zenari L, Bonora E, Targher G. Evidence of left atrial remodeling and left ventricular diastolic dysfunction in type 2 diabetes mellitus with preserved systolic function. *Nutr Metab Cardiovasc Dis*. 2016 Nov;26(11).
16. Mantovani A, Trombetta M, Imbriaco C, Rigolon R, Mingolla L, Zamboni F, Dal Molin F, Cioccoloni D, Sanga V, Bruti M, Brocco E, Conti M, Ravenna G, Perrone F, Stoico V, Bonora E. Diabetic foot complicated by vertebral osteomyelitis and epidural abscess. *Endocrinol Diabetes Metab Case Rep*. 2016; 2016:150132.
17. Trombetta M, Dauriz M, Bonetti S, Travia D, Boselli L, Santi L, Bonora E, Bonadonna RC. Is common genetic variation at IRS1, ENPP1 and TRIB3 loci associated with cardiometabolic phenotypes in type 2 diabetes? An exploratory analysis of the Verona Newly Diagnosed Type 2 Diabetes Study (VNDS) 5. *Nutr Metab Cardiovasc Dis*. 2016 Mar;26(3):232-8.
18. Dauriz M, Trombetta M, Boselli L, Santi L, Brangani C, Pichiri I, Bonora E, Bonadonna RC. Interleukin-6 as a potential positive modulator of human beta-cell function: an exploratory analysis-the Verona Newly Diagnosed Type 2 Diabetes Study (VNDS) 6. *Acta Diabetol*. 2016 Jun;53(3):393-402.
19. Grancini V, Trombetta M, Lunati ME, Zimbalatti D, Boselli ML, Gatti S, Donato MF, Resi V, D'Ambrosio R, Aghemo A, Pugliese G, Bonadonna RC, Orsi E. Contribution of  $\beta$ -cell dysfunction and insulin resistance to cirrhosis-associated diabetes: Role of severity of liver disease. *J Hepatol*. 2015 Dec; 63(6):1484-90.
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Bonadonna RC, Bonora E. Prevalence of Cardiovascular Autonomic Neuropathy in a Cohort of Patients With Newly Diagnosed Type 2 Diabetes: The Verona Newly Diagnosed Type 2 Diabetes Study (VNDS). *Diabetes Care*. 2015 Aug;38(8):1487-93.

21. Zoppini G, Galletti A, Targher G, Brangani C, Pichiri I, Trombetta M, Negri C, De Santi F, Stoico V, Cacciatori V, Bonora E. Lower levels of 25-hydroxyvitamin D3 are associated with a higher prevalence of microvascular complications in patients with type 2 diabetes. *BMJ Open Diabetes Res Care*. 2015 Apr 24;3(1).

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31. Targher G, Pichiri I, Zoppini G, Trombetta M, Bonora E. Increased prevalence of cardiovascular disease in Type 1 diabetic patients with nonalcoholic fatty liver disease. *J Endocrinol Invest.* 2012 May;35(5):535-40.
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37. Zoppini G, Targher G, Trombetta M, Lippi G, Muggeo M. Relationship between soluble CD40 ligand and gamma-glutamyltransferase concentrations in non-drinking, young Type 1 diabetic individuals. *Diabet Med.* 2008 Nov;25(11)
38. Zoppini G, Verlato G, Targher G, Bonora E, Trombetta M, Muggeo M. Variability of body weight, pulse pressure and glycaemia strongly predict total mortality in elderly type 2 diabetic patients. The Verona Diabetes Study. *Diabetes Metab Res Rev.* 2008 Nov-Dec;24(8):624-8.
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41. Trombetta M, Spiazzi G, Zoppini G, Muggeo M. Review article: type 2 diabetes and chronic liver disease in the Verona diabetes study. *Aliment Pharmacol Ther.* 2005 Nov;22 Suppl 2:24-7.

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43. Weiss R, Caprio S, Trombetta M, Taksali SE, Tamborlane WV, Bonadonna R. Beta-cell function across the spectrum of glucose tolerance in obese youth. *Diabetes*. 2005 Jun;54(6):1735-43.