

CURRICULUM VITAE

Teresa Gonçalves

Name, place and date of birth. Nationality

Teresa Maria Fonseca de Oliveira Gonçalves
Viseu; 15/1/1964. Portuguese

Institutional address

Microbiologia
Faculdade de Medicina da Universidade de Coimbra
Centre for Neurosciences and Cell Biology
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Academic degrees

Agregação (Habilitation) in Biomedical Sciences, University of Coimbra (2016)
PhD Degree in Cellular Biology, University of Coimbra (1994)
Masters Degree in Cellular Biology, Faculty of Sciences and Technology, University of Coimbra (1990)
Degree in Biology, Faculty of Sciences and Technology, University of Coimbra (1987)

Present Positions

Professora Auxiliar, Faculty of Medicine, University of Coimbra, since March 2001.
Principal Investigator of the Centre for Neuroscience and Cell Biology (Medical Microbiology; http://www.cnbc.pt/research/areaD2_2.asp?lg=2).

Previous professional activities

1997 – 2001: Professora Auxiliar, Faculdade de Medicina da Universidade de Lisboa
1994 – 1997 Technical and I&D Director, Pharmaceutical Company
1990 – 1994 PhD Grantee Gulbenkian Foundation; Gulbenkian Institute of Science

Areas of interest and research

Medical Microbiology (identification of natural products as sources of antimicrobials - antiviral, antifungal and antibacterial; regulation of gut microbiota)
Medical mycology (host-pathogen interactions; mechanisms of antifungal susceptibility; epidemiology of fungal infections)
Molecular identification of infectious agents

Supervising experience

Supervision of three PhD and twelve Masters Thesis, already concluded.
Presently is supervising two post-docs, three PhD students and 2 MSc students
Supervision of graduation students of Biology, Engineering, Dentistry and Medicine (Masters).

Research projects

Yeast Chromogenic Media "Chromopym" – INOV.C Strategical Program 2013
Participant PTDC/BBB-BEP/0695/2012 (2013-2015) "Ambiguity and virulence in a human pathogen"
Principal Investigator for FCT project PTDC/SAU-MII/115598/2009 - Role of adenosine and A2A receptor in anti-Candida immunity.
Participant in the FCT project PTDC/SAU-MET/111398/2009 – Role of the intestine in promoting the lipogenic effects of fructose"

Principal Investigator for FCT project "Alternaria infectoria FKS, CHS and melanin synthesis genes: the combination to oportunism" coordinator of the project PTDC/SAU-ESA/108636/2008

Principal Investigator for FCT project ("Role of extracellular ATP and characterization of purinergic receptors in the resistance of *Candida albicans* to macrophage attack" coordinator of the FCT project PTDC/SAU/FCF/81436/2006)

Responsible Investigator for Project MSG MSD P-1599 granted by MERCK, SHARP & DOHME, Inc. (Medical School Grant)

Responsible Investigator for Project PYM (Agência de Inovação) – partner FMUC.

Prizes and Distinctions

2012 Honorable Mention III Meeting Brasilian Purines Club

2012 MasterClass da European Society for Paediatric Infectious Diseases (ESPID).

Patents

INPI PPP 109204 B

Publications

Rodrigues L, Miranda IM, Andrade GM, Mota M, Cortes L, Rodrigues AG, Cunha RA, Gonçalves T. Blunted dynamics of adenosine A2A receptors is associated with increased susceptibility to *Candida albicans* infection in the elderly. *Oncotarget*. 2016 Aug 31. doi: 10.18632/oncotarget.11760.

Costa AL, Silva BM, Soares R, Mota D, Alves V, Mirante A, Ramos JC, Maló de Abreu J, Santos-Rosa M, Caramelo F, Gonçalves T. Type 1 diabetes in children is not a predisposing factor for oral yeast colonization. *Med Mycol*. 2016 Sep 24. [Epub ahead of print] doi: 10.1093/mmy/myw092

Soares R, Rocha G, Meliço-Silvestre A, and Gonçalves T (2016). HIV1-viral protein R (Vpr) mutations: associated phenotypes and relevance for clinical pathologies. *Rev Med Virol*, doi: 10.1002/rmv.1889. (Impact Factor: 5.574)

Fernandes C, Gow NAR, Gonçalves T (2016). MMD-Chs, chitin synthase enzymes with myosin-like domains and the pathogenesis of filamentous fungi. *Fungal Biology Reviews*, 30:1-14. doi:10.1016/j.fbr.2016.03.002 (SCImago Journal Rank (SJR): 1.529)

Soares F, Fernandes C, Silva P, Pereira L and Gonçalves T (2016). Antifungal activity of carrageenan extracts from the red alga Chondracanthus teedei var. lusitanicus. *J Appl Phycol* DOI 10.1007/s10811-016-0849-9 (Impact factor 2.559)

Rodrigues L, Russo-Abrahão T, Cunha RA, Gonçalves T and Meyer-Fernandes JR (2016) Characterisation of extracellular nucleotide metabolism in *Candida albicans*. *FEMS Microbiol Lett* 363(1):fnv212. DOI: <http://dx.doi.org/10.1093/femsle/fnv212> (Impact factor 2.121)

Fernandes C, Prados-Rosales R, Silva B, Nakouzi-Naranjo A, Zuzarte M, Chatterjee S, Stark RE, Casadevall A, Gonçalves T (2016). Activation of melanin synthesis in Alternaria infectoria by antifungal drugs. *Antimicrob Agents Chemother* 60 (3): 1646-1655. doi: 10.1128/AAC.02190-15 (Impact factor 4.476)

Diogo P, Gonçalves T, Palma P., Santos JM. (2015). Photodynamic Antimicrobial Chemotherapy for Root Canal System Asepsis: A Narrative Literature Review.

Coelho C, Souza AC, Derengowski L, Leon-Rodriguez C, Wang B, Leon-Rivera R, Bocca AL, Gonçalves T, Casadevall A. (2015). Macrophage Mitochondrial and Stress Response to Ingestion of *Cryptococcus neoformans*. *J of Immunology*, 194:2345-57. doi: 10.4049/jimmunol.1402350. (Fator de impacto = 5.362; Q1)

Bento D, Staats HF, Gonçalves T, Borges O (2015). Development of a novel adjuvanted nasal vaccine: C48/80 associated with chitosan nanoparticles as a path to enhanced mucosal immunity. *Eur J Pharm Biopharm*. 2015 Mar 26. pii: S0939-6411(15)00157-5. doi: 10.1016/j.ejpb.2015.03.024. (Fator de impacto = 4.245; Q1)

George J, Gonçalves FQ, Cristóvão G, Rodrigues L, Meyer-Fernandes JR, Gonçalves T, Cunha RA, Gomes CA (2015). Different danger signals differently impact on microglial proliferation through alterations of ATP release and extracellular metabolism. *GLIA*. doi: 10.1002/glia.22833 (Fator de impacto = 5.466; Q1)

Gonçalves T (2014). Princípios Gerais de Micologia: Estrutura e Multiplicação dos Fungos. In: *Micologia Médica*. pg 44-48. Lidell, Lisboa.

Soares R, Rocha G, Nogueira C, Meliço-Silvestre A and Gonçalves T (2013). Simultaneous R77Q and Q3R HIV1-Vpr mutations in an otherwise asymptomatic 5-year old child with repeated ear infections. *Journal Medical Microbiology Case Reports*. doi: 10.1099/jmmcr.0.002709

Fernandes C, Anjos J, Walker LA, Silva BMA, Cortes L, Mota M, Munro CA, Gow NAR, Gonçalves T (2014). Modulation of *Alternaria infectoria* cell wall chitin and glucan synthesis by cell wall synthase inhibitors. *Antimicrobial Agents and Chemotherapy*. 58(5): 2894 – 2904. DOI: 10.1128/AAC.02647-13.

Silva BMA, Prados-Rosales R, Espadas-Moreno J, Wolf JM, Luque-Garcia JL, Gonçalves T, Casadevall A (2014). Characterization of *Alternaria infectoria* extracellular vesicles. *Medical Mycology*. 52 (2): 202-210. DOI: 10.1093/mmy/myt003

Miranda I, Silva-Dias A, Rocha R, Teixeira-Santos R, Coelho C, Gonçalves T, Santos MAS, Pina-Vaz C, Solis NV, Filler SG, Rodrigues AG (2013). *Candida albicans* CUG Mistranslation Is a Mechanism To Create Cell Surface Variation. *mBio* Aug 30;4(4). pii: e00285-13. doi: 10.1128/mBio.00285-13.

Bento D, Borchard G, Gonçalves T and Borges O (2013). Validation of a New 96-Well Plate Spectrophotometric Method for the Quantification of Compound 48/80 Associated with Particles. *AAPS PharmSciTech*, 14 (2):649 DOI: 10.1208/s12249-013-9950-4

Marques J, Paula A, Gonçalves T, Ferreira M, Carrilho E (2013). Ozone action on *Streptococcus mutans* and *Lactobacillus fermentum* : A pilot study. *World J Stomatol* 2013 2(1): 18-23. doi:10.5321/wjs.v2.i1.18

Coelho C, Lydia Tesfa, Jinghang Zhang, Johanna Rivera, Teresa Gonçalves, and Arturo Casadevall.(2012) Analysis of Cell cycle and Replication of Mouse Macrophages after *in vivo* and *in vitro* *Cryptococcus neoformans* infection using Laser Scanning Cytometry. *Infection Immunity*, 80(4):1467-78 doi: 10.1128/IAI.06332-11.

Anjos J, Fernandes C, Abrunheiro A, Quintas C, B Silva, A, Gow NAR, Gonçalves T (2012). "Beta-(1,3)-Glucan synthase complex from *Alternaria infectoria*, a rare

dematiaceous human pathogen". Medical Mycology, 50:716–725 doi: 10.3109/13693786.2012.675525.

Alves M, Gonçalves T, Quintas C. (2012) Microbial quality and yeast population dynamics in cracked green table olives' fermentations. Food Control 23: 363 doi.org/10.1016/j.foodcont.2011.07.033

Santo DE, Galego L, Gonçalves T and Quintas C (2012) Yeast diversity in the Mediterranean strawberry tree (*Arbutus unedo* L.) fruits' fermentations, Food Research International, 47:45

Medeiros JAS, Gonçalves TMFO, Boyanova L, Pereira MIC, Carvalho JNSP, Pereira AMS and Cabrita AS (2011). Evaluation of *Helicobacter pylori* eradication by triple therapy plus *Lactobacillus acidophilus* compared to triple therapy alone. Evaluation of *Helicobacter pylori* eradication by triple therapy plus *Lactobacillus acidophilus* compared to triple therapy alone. Eur J Clin Microbiol Infect Dis. 30(4):555

Ricardo E, Silva AP, Gonçalves T, Costa de Oliveira S, Granato C, Martins J, Rodrigues AG, Pina-Vaz C (2011). *Candida krusei* reservoir in a neutropaenia unit: molecular evidence of a foe? Clin Microbiol Infect Clinical Microbiology and Infection. 17: 259

Paulo C, Mourão C, Veiga PM, Marques JM, Rocha G, Alves AF, Querol A, Meliço-Silvestre AA, Gonçalves I, Flores, Clemente C, Gonçalves T (2009) Retrospective analysis of clinical yeast isolates in a hospital in the centre of Portugal: spectrum and revision of the identification procedures. Med Mycol 47 (8): 836-844

Hipolito E, Faria E, Alves AF, Hoog GS, Anjos J, Gonçalves T, Morais PV & Estêvão H (2009) *Alternaria infectoria* brain abscess in a child with chronic granulomatous disease. Eur J Clin Microbiol Infect Dis 28 (4) : 377-380

Marques JM, Rodrigues, RJ, Magalhães-Sant'Ana, AC and Gonçalves T (2006). *Saccharomyces cerevisiae* exposure to bacterial endotoxin induces Hog1 activation. Journal of Biological Chemistry, 281(34): 24687-24694

Pinto-de-Oliveira A, McCance D, Magalhães-Sant'Ana AC, Marques JM and Gonçalves T (2005) Expression of HPV16 E6 oncoprotein increases stress resistance in *Saccharomyces cerevisiae*. FEMS Yeast Res 5: 777-787

Brandão RL, Etcheberre L, Queiroz CC, Tropia MJ, Ernandes JR, Gonçalves T, Loureiro-Dias MC, Thevelein JM, Leiper FC, Carling D and Castro IM (2002). "Evidence for the involvement of *Saccharomyces cerevisiae* protein kinase C in glucose induction of the HXT genes and derepression of SUC2" FEMS Yeast Research., 2; 93-102

Ma P, Gonçalves T, Maretzec A, Loureiro Dias MC, Santos H and Thevelein JM (1997). "The lag phase rather than the exponential growth phase on glucose is associated with a higher cAMP level in wild type and cAPK-attenuated strains of the yeast *Saccharomyces cerevisiae*". Microbiology, 143: 3451-3459.

Sousa-Dias S, Gonçalves T, Leyva JS, Peinado JM and Loureiro-Dias MC (1996). "Kinetics and regulation of fructose and glucose transport systems are responsible for fructophily in *Zygosaccharomyces bailii*". Microbiology, 142: 1733-1738.

Gonçalves T and Loureiro-Dias MC (1994), "Aspects of glucose uptake in *Saccharomyces cerevisiae*". Journal of Bacteriology, 176(5):1511-1513.

Gonçalves T, Carvalho AP, Oliveira CR (1990), "Antiperoxidant effects of calcium antagonists on microsomal membranes isolated from different brain areas". European Journal of Pharmacology, 204 :315-322.