

## **CV of Dr. Dawit Abate**

### **Date and Place of Birth**

**Nationality -** Eti

**Present address -** Departm

### **EDUCATION**

### **ACADEMIC**

### **EXPERIENCE**

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### **MAIN RESEARCH AREAS**

Mycotoxicology, Grain Storage Fungi, Bioactive Fungal Products, Plant Microbe Interaction, Plant Pathology, Fungal/Microbial Control of Pests, Fungal Diversity and Ecology, Mushroom Cultivation, Food microbiology and Preservation.

### **MEMBERSHIP IN PROFESSIONAL SOCIETIES**

Biological Society of Ethiopia, Natural Products Research network of Eastern and Central Africa (NAPRECA), British Mycological Society, African Mycological Association, International Plant Protection Society, International Society for Mushroom Biology and Mushroom Products

## **GRADUATE AND UNDERGRADUATE COURSES TAUGHT**

Introduction to Mycology, General Microbiology,  
Fungal Biodiversity and Systematics, Environmental Microbiology, Food  
Microbiology, Applied Microbiology, Advanced Mycology, Plant  
Pathology, Fungal Physiology and Ecology.

## **SEMINARS/CONFERENCES**

UNESCO Course, Microbial Technology, Institute of Microbiology,

Prague, Czechoslovakia, October, 1984 to September, 1985

International Course in Industrial Biotechnology, GBF, Braunschweig,  
Germany, September, 6-22, October 1993

Bioassay Techniques for Detection and fractionation of Bioactive  
Natural Projects, International Organization of Chemistry in  
Development (IOCD), November 18-24, 1990, ICIPE, Nairobi, Kenya

Bionet International Global Workshop, Cardiff, UK, August 20-26, 1995.

IOCD International Symposium, Chemistry, Biological and  
Pharmacological Properties of African Medicinal Plants. February 25-28  
1996, Victoria Falls, Zimbabwe

International Workshop on Capacity Building for Sustainable  
Development, Third World Network Scientific Organizations, October  
10-13, 2006, Trieste, Italy

EMPRESS/FAO Regional Workshop on Implementation of Biological  
Control Agents against the Desert Locust, Cairo, April 17-29, 1999

## **PROJECT MANAGEMENT/CONSULTANCY**

2001-2003 Program Officer, Sustainable Development from Africa's  
Biodiversity, UN Office for Project Services, Windhoek, Namibia

1999-2000 UN Department of Economic and Social Affairs, Project  
Nam/97/006

1999 Malawi Investment Promotion Agency, Training courses on  
Technology of Mushroom Cultivation

1995-1996 Ethiopian Society for appropriate Technology,

2007-2008 Institute of Sustainable Development, Training on  
Mushroom Cultivation and job creation for young people

2013-2014 Horn of Africa Regional Environmental Network , Value  
addition and Sustainable Utilization of Coffee waste

## SCIENTIFIC PUBLICATIONS

- Abate D.** (1989) Bioactive Metabolites from Fermentation Cultures of Ethiopian Basidiomycetes. Ph.D thesis, University of Kaiserslautern, Germany
- Abate D.** (1998) *Mushroom Cultivation: A Practical Approach*, Berhanena Selam Printing Press, Addis Ababa, 218pp.
- Abate D.** (1995) Cultivation of the oyster mushroom in traditional brick pots. *Mycologist* 9: 179-81
- Abate D.** (1998) *Agaricus campestris* on high grazing land. *Mycologist* 18:21
- Abate D.** (2006) The flowing mushrooms of Ethiopia. *Baobab* 48: 6-10
- Abate D.** (2010) *Mushroom cultivation in Ethiopia: Sharing Innovative Experiences*, TWAS/UNDP, Global South-South Development Academy
- Abate D.** (2009) Potential of Mushroom Cultivation in Ethiopia. *Tiret* 39:41 Addis Ababa
- Abate D.** (1998) Cultivation of the oyster mushroom in traditional brick pots. *The International Journal of Small-Scale Food Processing*. 23: 23-24
- Abate D.** (1995) Search for potential drugs from higher fungi, 15<sup>th</sup> Annual Conference of the Ethiopian Pharmaceutical Association, Addis Ababa
- Abate D.** (1995) Mushroom and mushroom cultivation in Ethiopia. 5<sup>th</sup> Annual Conference of the Biological Society of Ethiopia, Addis Ababa
- Abate D.** (1998) Microorganisms and Biotechnology in Industry Workshop on Biotechnology and Biosafety (Editor Haile Selassie and Abebe Demissie) Institute of Biodiversity Conservation and Research, Addis Ababa
- Abate D.** Abraham W.R (1994) Antimicrobial metabolites from *Lentinus crinitus*. *The Journal of Antibiotics* 47: 1348-1350
- Abate D.** Abraham W.R., Meyer H. (1997) Cytochalasins and Phytotoxins from *Xylaria obovata*. *Phytochemistry* 44: 1443-1448
- Abate D.**, Berhanu A.G (1985) Prevalence of *Aspergillus flavus* in Ethiopian cereal grains: a preliminary Survey. *Ethiop. Med.J.* 23: 143-148
- Abate D.**, Fesseha S. (1995) *in vivo* and *in vitro* antifungal activity of Endod, *Phytolaca dodecandra*. In: *Present Status and Future Trends of*

*Research on Endod and Schistosomiasis in Ethiopia* (eds. Gemetchu et al.) Addis Ababa University Press.

Abraham W.R., **Abate D.** (1995) Chromanones from *Lentinus crinitus*. *Z. Nat. Forschung* 50c: 748-750

Abraham W.R., Meyer H.,**Abate D.** (1995) Curvupallides, new class of Alkaloids from the fungus *Curvularia Pallescens*. *Tetrahedron* 51: 4947-4952

Assefa A., **Abate D.**, Stenlid J.( 2015) Characterization of *Pyrofomes demidoffii* from Ethiopian afromontane forests. *Forest Pathology* doi:10.1111/efp.12166

Assefa A., **Abate D.**, Stenlid J.( 2014) *Corynelia uberata* as a threat to regeneration of *Podocarpus falcatus* in Ethiopian forests: spatial pattern and temporal progress of disease and germination studies. *Plant Pathology*. Doi.111/ppa.12295

Assefa A., **Abate D.**, Stenlid J.( 2014) Characterization of *Corynelia uberata* Fr. , a putative fungal pathogen of *Podocarpus falcatus* in Ethiopia. *Forest pathology* 44:45-55

Ayalew A. **Abate D.**, Hulluka M (1995) Mycoflora, aflatoxins and resistance of groundnut cultivars from Eastern Ethiopia.  
*SINET:Ethiop.J.Sci.* 18:117-131

Ayalew A., Fehrman H., Lepschy J., Beck R., **Abate D** (2006) Natural occurrence of mycotoxins in staple cereals from Ethiopia.  
*Mycopathologia* 162:57-63

Aysheshim S., Seyoum E., **Abate D** (2003) Evaluation of Ethiopian isolates of enthomopathogenic fungi as potential biological control agents of the desert locust. *Pest Management Journal of Ethiopia* 7:1-9

Babu B., kefialew Y.W., Ping-Fang L., Xin-Ping Y., George S., Newberry, E., Dufault N., **Abate D.**, Ayalew A., Marios.J. Paret M.L (2014) Genetic characterization of *Didymella bryoniae* infecting watermelon and other cucurbits in Florida and Georgia (submitted to *Plant Disease*)

Bedelu T., Gessese A. and **Abate D.** (1998) Correlation of protease production to nematode degrading ability of two *Arthrobotrys* strains. *World Journal of Microbiology and Biotechnology* 14:731-734

Bitew A., **Abate D.** (1994) Antifungal metabolites from submerged culture of *Ganoderma lucidum* (polypore). *Ethiop.J.Health Dev.* 8:63-70

Bitew A., **Abate D.** (1995) Preliminary screening of basidiomycetes for antimicrobial activity. *Ethiop. Pharm.J.* 12:28-37

Dagne E., Abate D. (1995) Bioactive compounds from plants and higher fungi of Ethiopia. In: *Phytochemistry of Plants and higher fungi of Ethiopia*. In: *Phytochemistry of Plants Used in Traditional Medicine* (Eds Hostettmann et al) Clarendon Press, Oxford.

Dagne E., Gunatilaka A. A.L., Asmellash S., Abate D., Kingston, D.G.I., Hofmann G.A., Johanson R.K. (1994) Two new cytotoxic cytochalasins from *Xylaria obovata*. *Tetrahedron* 50: 5615-5620

Dagne E., Asmellash S., Abate D. (1993) An antifungal polyacetylenic compound from the culture filtrate of the fungus *Trametes pubescens*. *Journal of Natural Products* 57: 390-392

Dagne E., Abate D., Stadler M., Anke H., Sterner O (1991). Biologically active compounds from diverse sources, 4<sup>th</sup> NAPRECA Symposium on Natural Products Dec. 16-21, 1991, Addis Ababa

Girma A., Abate D. (2009) *Issues and Challenges in Food Security* Proceedings of a National Workshop of the Biological Society of Ethiopia. Addis Ababa

Gume B., Muleta D., Abate D (2013) Evaluation of locally available substrates for cultivation of oyster mushroom (*Pleurotus ostreatus*) in Jimma, Ethiopia. *African Journal of Microbiology Research* 6: 2228-2237

Hadis M., Abate D. (2002) Pathogenecity of Ethiopian isolates of *Metarrhizium anisopliae* and *beauveria bassiana* against the Tsetse fly, *Glossina morsitans*. *Pest management journal of Ethiopia* 6:23-29

Kassu A., Dagne E., Abate D., Castro A., van Wyk B.E (1999) Ethnomedical aspects of the commonly used tooth sticks in Ethiopia. *East African Medical Journal* 76:651-653

Kefialew Y., Ayalew A., D. Abate, Paret M (2015) SAR inducer tiadnil and thymol-based formulations for management of gummy stem blight on water melon. (accepted for publication in *Plant Disease*)

Seyoum A., Abate D. (1997) Larvicidal efficacy of *Bacillus thuringiensis* var.*israelensis* and *B. sphaericus* on *Anopheles arabiensis* in Ethiopia. *World Journal of Microbiology and Biotechnology* 13: 21-24

Taye T., Brossman M., einhorn G., Buettner C., Metz R., Abate D (2002) The potential of pathogens as biological control of parthenium weed (*Parthenium hysterophorus*). *Med. Fac. Landbouww. Univ. Gent* 67:409-420

Woldeamanuel Y., Abate D. (1998) Characterization of *Candida albicans* isolates from the oral cavity of HIV positive patients. *Ethiop. Med. J.* 36: 235-243

- Woldeammanuel Y., Chrysanthous, Petrini, B, **Abate D.** (1996) *Cryptococcus neoformans* isolated from 6 Ethiopian HIV positive patients with meningitis. *Ethiop. Med. J.* 34:259
- Woldeammanuel Y., Jemaneh L., **Abate D** (2001) Isolation and characterization of *Cryptococcus neoformans* from environmental sources in Ethiopia. *Ethiop.J. Health Dev.* 15:45-49
- Wubet T., **Abate D.** (2000) Common toxigenic Fusarium species in maize grain in Ethiopia SINET: *Ethiop. J. Sci.*, 23:73-86
- Zewdu A., **Abate D** (2012) Improvement of injera shelf life through the use of chemical preservatives. *African Journal of Food, Agriculture, Nutrition and Development* 12: 6411-6423.
- Zewdu A., **Abate D.**, Desse G, Ziegler G.R (2014) Antioxidant properties of edible mushrooms collected from Ethiopia. *Food Chemistry* 157 :30-36.
- Zewdu A., **Abate D.**, Desse G, Ziegler G.R., Harratine K (2015). Fatty acid profile of wild and cultivated mushrooms collected from Ethiopia. *Nutrition and Food Science* 5: 360 doi:10.4172/2155-9600.1000360
- Zewdu A., **Abate D.**, Desse G, Ziegler G.R. (2015). LC-MS/MS Based Metabolomics to identify biomarkers unique to *Laetiporus sulphureus*. *International Journal of Nutrition and Food Science*, 4:141-153
- Zhou Li-Wei, Vlasak J., Decock C., Assefa A., Stenlid J., **Abate D.**, Wu Sheng-Hua, Dai, Yu-Cheng (2015) Global diversity and taxonomy of the *Innotus linteus* complex (Hymnochaetales, Basidiomycota: *Sanhuangporus* gen.novo., *Tropicoporus excentrodendri* and *T. guanacastensis* gen.et spp. nov., and 17 new combinations. *Fungal Diversity*. DOI:10.1007/s13225-015-0335-8
- RESEARCH GRANTS**
- Science and Technology Commission, Addis Ababa, Ethiopia
- German Technical Cooperation (GTZ), Germany
- International Foundation for Science (IFS), Stockholm, Sweden
- NUFU, Oslo, Norway
- BioInnovate Project ILRI/ Kenya, Sida/ SAREC, Sweden

#### SERVICES RENDERED

Member, Academic Committee of the Department of Biology, Addis Ababa University, 1992-1996

**Secretary, Faculty Graduate Committee, Faculty of Science, Addis Ababa University 1993-1995**

**Member, National Task Force for Establishment of Institute of Biodiversity Conservation and Research, Addis Ababa, 1993-1995**

**Member, National Health Research Council, Ethiopian Science and Technology Commission, Addis Ababa, 1995**

**Associate Editor, Ethiopian Journal of Science, Addis Ababa University, 1992-1995**

**Head, Department of Biology, Addis Ababa University, 2004-2006**

**President, Biological Society of Ethiopia (2006-2009)**

**Dean, Faculty of Life Science (2009- 2012), Addis Ababa University**

**LIST OF REFERENCES WITH CONTACT INFORMATION**