

CURRICULUM VITAE

ALLA SHNYREVA, Dr. Sci.

Leading Research Scientist
Lecturer in Fungal Genetics

Department of Mycology & Algology
Faculty of Biology
Moscow Lomonosov State University
Moscow 119991, Russian Federation
Tel: +7 495 9393 5057 (w.)
+ 7 903 6605516 (m.)
Fax: +7 495 - 939 3970
E-mail: ashn@mail.ru
shnyreva@herba.msu.ru

RESEARCH INTERESTS:

- Population biology and fungal genetics
- Phylogenetics and molecular taxonomy
- Medicinal mushroom: immunomodulating properties of mushroom polysaccharides

ACTIVITIES:

Courses taught at Moscow State University, Russia:

- Fungal Genetics
- Molecular Taxonomy of Fungi
- Genomics

Training course on Molecular Taxonomy and Genetics.

Supervising Graduates and Ph.D students.

Referee for journals "Russian Journal of Genetics", "Microbiologia", "Mikologia i Phytopathologia".

EDUCATION:

M.Sc. (Mycology) 1982. Moscow Lomonosov State University, Russia.

Ph.D. (Mycology), 1986. Moscow Lomonosov State University, Russia.

Dr.Sci. (Mycology/Genetics), 2005. Moscow Lomonosov State University, Russia.

APPOINTMENTS:

Since 2004: Leading Research Scientist, Lecturer in Fungal Genetics, Dept. Mycology & Algology, Moscow State University.

1998-2003: Senior Research Scientist, Lecturer, Dept. Mycology & Algology, Moscow State University.

1991-1997: Research Scientist, Dept. Mycology & Algology, Moscow Lomonosov State University.

1986 - 1990: Research Associate, Dept. Molecular Biology, Moscow State University.

Research area:

- Study on host-fungus interactions in VAM symbiosis (*Glomus spp.*): phosphorus metabolism and extracellular enzymes secretion.

1982 - 1985: Post-Graduate Student, Dept. Mycology & Algology, Moscow State University.

RESEARCH EXPERIENCE:

- 2008: Exchange Academic, Plant Research International, Wageningen University, The Netherlands.
- 2004: Visiting Scientist, College of Agriculture and Human Services, Prairie View A&M University, USA
Research area:
- Optimization of soil bioremediation under extreme conditions by using molecular techniques and biosensors.
- 1993-1996: Visiting Academic, Life Sciences, King's College London, UK
Research area:
- Molecular analysis of laccase genes family in *Agaricus bisporus*.
- 1991: Visiting Scientist, Dept. Biochemistry, University of Montreal, Canada.
Research area:
- Sequence analysis of mitochondrial genome in *Phytophthora* species.

AWARDS, FELLOWSHIPS, MEMBERSHIP OF PROFESSIONAL SOCIETIES:

ERASMUS MUNDUS International Academic mobility and cooperation grant, 2008.
Collaborative Research Grant, NATO Science Program, 2003-2004.
Research grants of Russian Funds for Basic research, 1996-1998, 2001-2004, 2006-2008.
Research Fellowship, European Environment Research Organization (EERO), 1996.
Research Fellowship, Royal Society (UK), 1994-1996.
Research Fellowship, Federation of European Biochemical Societies (FEBS), 1993.
A.N.Belozersky scholarship award for Excellence in Biology, 1979-1982.
Member of All-Russian Academy of Mycology.
Member of Russian Biochemical Society.
Founder Member of European Mycological Association.
Research work has been presented at various national and international conferences, including IMC7 and IMC8.

Collaborating

- Institute of General Genetics, Russian Academy of Science
- Russian Association of Mushroom Growers
- Russian Space Agency, RKK "Energia"
- Prairie View A&M Texas University, USA
- Plant Research International, University of Wageningen, The Netherlands.

LANGUAGES: Russian, Ukrainian, English (fluent).

LIST OF SOME RECENT PUBLICATIONS:

- Shnyreva A.V. 2008. Mating compatibility and clonality in the summer oyster mushroom, *Pleurotus pulmonarius* // In: Science and cultivation of edible and medicinal fungi. Mushroom Science XVII. Proceedings of the 17th Congress of the International Society for Mushroom Science. Cape Town, South Africa, 20-24 May 2008. P. 191-204.
- Shnyreva A.V. 2008. Low temperature sensitivity as a factor of reproductive isolation between the closely related *Pleurotus* species. – *Mikologia i Fitopatologia*, in press.
- Shnyreva A.V. 2007. Population genetics of fungi (a review). – In: Advances in Mycology. Ed. Y. Dyakov, Y. Sergeev, Vol.1. Moscow: National Academy of Mycology. P. 76-106.
- Shnyreva A.V. 2006. Molecular gene typing of commercial strains of cultivated edible mushrooms. – *School of Mushroom Growers*, Vol. 4 (40), p. 48-51.

Shnyreva A.V., Shtaer O.V. 2006. Differentiation of two closely related species *Pleurotus pulmonarius* and *Pleurotus ostreatus* by mating and molecular markers – *Russian Journal of Genetics*, Vol. 42(5): 667-674.

Dyakov Y.T., Shnyreva A.V., Sergeev Y.V. 2005. Fungal Genetics (a book) - Moscow: Akademia Press, 304 P.

Shnyreva A.V. 2005. Methods of molecular taxonomy in applied mycology. – In: *Advances in Medicinal Mycology*, Vol. 5, p. 21-24.

Shtaer O.V. Shnyreva A.V. 2005. Somatic incompatibility in natural populations of *Pleurotus pulmonarius* – In: *Fungi in natural and anthropogenic ecosystems*, p. 323-327.

Shnyreva A.V., Shtaer O.V., Belokon Y.S., Belokon M.M. 2005. Comparative analysis on natural strains of *Pleurotus ostreatus* – *Mikrobiologia*, 74(2): 231-238.

Shnyreva A.V. 2004. Immunomodulating properties of glucans produced by basidiomycete fungi. – In: *Advanced Medicinal Mycology*, Vol.3, p. 189-192.

Shnyreva A.V., Belokon Y.S., Belokon M.M., Altukhov Y.P. 2004. Interspecies genetic variability of the oyster mushroom, *Pleurotus ostreatus*, as revealed by allozyme genes analysis. - *Russian Journal of Genetics* 40 (8): 1068-1080.

Shnyreva A.V., Belokon Y.S., Belokon M.M. 2004. Isoenzyme variability among natural *Pleurotus ostreatus* isolates collected in Moscow region – *Mikologia i Fitopatologia*, 38 (2): 59-67.

Shnyreva A. 2003. Transposable elements as factors of genome rearrangements and modifications in fungi (a review paper) - *Russian Journal of Genetics*, 39 (5): 621-636.

Shnyreva A.V., Belokon Y.S., Belokon M.M. 2003. Differentiation of the cultivated strains of two edible mushrooms, *Pleurotus ostreatus* and *Agaricus bisporus*, with molecular markers - *Russian Journal of Genetics* 39 (11): 1461-1469.

Shnyreva A.V. 2003. The genus *Pleurotus* (book chapter). – *Trends in Fungal Taxonomy and Systematics*. Moscow, National Mycol. Acad. Press: 418-441.

Kozlovskii A.G., Zhelifonova V.P., Adanin V.M., Shnyreva A.V., and Viktorov A.N. 2002. The biosynthesis of low-molecular-weight nitrogen-containing secondary metabolites – alkaloids – by the resident strains of *Penicillium chrysogenum* and *Penicillium expansum* isolated on board the “Mir” Space Station. – *Mikrobiologiya*, 71(6): 666-671.

Shnyreva A.V., Martynenko L.I., Romanov S.I. 2002. Complex approach in analysis of the oyster mushroom and the white button mushroom commercial strains deposited in “Zarech’ye” Plc. – *Gavrish*, No. 2: 34-38.

Shnyreva A.V. 2002. On selection criteria for cultivation in the wild-collected oyster mushroom strains. – *Mikologia i Fitopatologia*, 36 (4): 55-62.

Shnyreva A.V., Sizova T.P., Bragina M.P., Victorov A.N., Dyakov Yu.T.. 2001. Micromycetes at the space station 'Mir': resident or transient? – *Mikologia i Fitopatologia*, 35 (3): 121-127.

Smith M., Shnyreva A.V., Wood D. A., Thurston C.F. 2000. Tandem organization and highly disparate expression of the two laccase genes *lcc1* and *lcc2* in the cultivated mushroom *Agaricus bisporus*. - *Microbiology* 144: 1063-1069.