



QBiC SEMINAR

Speaker

David D. Thomas, Ph.D.

Department of Biochemistry, Molecular Biology, and Biophysics, University of Minnesota

**Date &
Location**

Wednesday, September 27, 2017, 15:00 - 15:40

Osaka, QBiC Bldg. A 1F lounge

(6-2-3, Furuedai, Suita, Osaka)

There will be a TV broadcast at Kobe CDB bldg.A 7F seminar room.

Title

Muscle Protein Structural Dynamics and Therapeutic Discovery

Abstract

We have used spectroscopic probes to develop new therapies for treating muscle disease, such as heart failure and muscular dystrophy. We attach probes (spin labels or fluorescent dyes) to selected sites on muscle proteins, then use time-resolved spectroscopy to determine structural changes during function and malfunction. This approach allows us to determine the mechanisms of action of these proteins, and to determine how these mechanism are altered by disease-causing mutations. Then we use these insights to develop new therapies for treating muscle disease.

We started a company, Photonic Pharma LLC, to make these new therapies available to the health care industry. This company is directed by Jennifer Jewell Thomas.

To learn more about our technology, visit our web sites:

Minnesota Muscle Laboratory: <https://cbs.umn.edu/ddt/home>

Photonic Pharma LLC: <http://www.photonicpharma.com/>

Host

Toshio Yanagida

Laboratory for Cell Dynamics Observation

yanagida@riken.jp

Tel: 06-6155-0469

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