

## Request for donations

### 1. Donation project

Donations for research on visual function regeneration

### 2. Activity to be supported

(1) Project title: Retinal Regeneration Project

#### (2) Outline

The RIKEN Center for Biosystems Dynamics Research (BDR) is conducting basic research in the fields of animal development and regeneration and regenerative medicines using pluripotent stem cells. In particular, BDR is dedicated to research aiming for retinal regeneration at the Laboratory for Retinal Regeneration Project lead by Masayo Takahashi. This research is based on a special program focusing on development of regenerative medicines.

This project involves research to activate the retinal potential to regenerate itself, as well as research for restoring the lost function of retinas damaged by disease, by transplanting retinal cells generated from pluripotent stem cells, such as iPS cells.

The project has started collaborative clinical research with neighboring medical institutes on "clinical research for transplanting retinal pigment epithelium (RPE) cells derived from human iPS cells for age-related macular degeneration".

This project will be continuously striving to develop therapies for all types of retinal diseases, diagnostic methods for the early discovery of disease, and technology to provide support for visually impaired persons. .

#### (3) Program/Project

- a. Program/Project leader  
Masayo Takahashi, Project Leader, Retinal Regeneration Project  
The RIKEN Center for Biosystems Dynamics Research (BDR)
- b. Research themes
  - Development of therapy for transplanting retinal cells
  - Retinal cell regeneration from intrinsic stem cells
  - Genetic diagnosis of retinal pigment degeneration
  - Molecular pathophysiology and therapy development in the field of retinal degeneration
  - Low vision care (development of rehabilitation and life support technology for visually impaired persons)

### 3. Amount required

140 million yen to end of 2025 (20 million yen per year)

### 4. Donation period

April 1, 2018 through March 31, 2025

### 5. Expenditure plan

- Research to develop regeneration therapy using retinal cells derived from iPS cells: 50 million yen
- Research to develop diagnostic technology for retinal diseases: 40 million yen
- Other (Disseminating research results, developing life support technology, etc.): 50 million yen

## **6. Donation procedures**

See RIKEN Donations at <http://www.riken.jp/about/support/solicited/> (English)

## **7. Inquiries regarding the program**

Miho Tokutake

Retinal Regeneration Project

RIKEN Center for Biosystems Dynamics Research (BDR)

2-2-3 Minatojima-minamimachi, Chuo-ku, Kobe, Hyogo

650-0047 Japan

Tel: +81-(0)78-306-0111 Fax:

+81-(0)78-306-0101 Email:

[retinalab@cdb.riken.jp](mailto:retinalab@cdb.riken.jp)