



Metabolic disorders including diabetes, 1.5 ECTS

Date	8-12 October 2018
Department	Public Health and Clinical Medicine, Medicine Umeå University
Course leaders	Tommy Olsson (tommy.g.olsson@umu.se) Mats Ryberg (mats.ryberg@umu.se) Julia Otten (julia.otten@umu.se)
Course administration	Elin Jakobsson (elin.jakobsson@umu.se) Gunilla Mårald (gunilla.marald@umu.se)
Language	English
Examination	Oral presentation of ongoing or putative projects
Participants	PhD-students, post docs, other researchers or clinicians interested in metabolic disorders
Number of participants	30
Application	e-mail to Gunilla Mårald no later than 2 September 2018
Selection of participants	Based on application date (PhD students have priority)

Course content

- Lectures about the metabolic syndrome, brown fat, type 2 diabetes, lifestyle intervention, bariatric surgery, type 1 diabetes, islet cell transplantations and diabetes complications
- Minisymposium about novel aspects on pathophysiology and treatment of type 2 diabetes with Ulf Smith (Gothenburg), Anders Rosengren (Gothenburg), Helena Edlund (Umeå) and Margit Mahlapuu (Gothenburg)
- Demonstration and practical training in the following research techniques: hyperinsulinemic euglycemic clamp, resting metabolic rate, physical activity measurement with accelerometers, body composition measurement with DXA