



Jeroen K. Vermunt, catedrático de la Universidad de Tilburg, impartirá la conferencia:

**"Modelos de clase latente y su conexión con los modelos de análisis factorial, TRI y regresión con efectos aleatorios",**

el día 2 de Junio de 2017, viernes, en horario de 10:00 a 14:00 horas en la Sala de Juntas y en la Sala de Informática 2 de la Facultad de Psicología de la UAM.

### Resumen de la conferencia:

This seminar deals with recent developments in the field of latent variable modelling. Techniques that were originally developed fully separate from one another turn out to be special cases of the broad family of generalized latent variable models (GLVMs). This family includes latent class analysis, finite mixture models, factor analysis, item response theory models, multilevel models, panel regression models, as well as models for dealing with missing data and selection bias. Recently, interesting hybrids combining elements of these special cases have been proposed, such as mixture factor analysis and mixture IRT, and multilevel variants of latent class analysis and IRT models.

In this seminar, I will introduce you into the framework of generalized latent variable modelling. I will take the most important special cases – mixture, IRT, and multilevel models – as starting point and from there elaborate on the connections between these. For example, I will show that one can perform multilevel analysis using mixture regression techniques, and that latent class analysis can be used for nonparametric and semiparametric IRT modelling. I will also pay attention to various recent developments that are of great interest to sociometricians and psychometricians. The two main application types that I will focus on are clustering and scaling on the one hand and dealing with dependent observations and multilevel modelling on the other hand. Not only empirical applications, but also technical issues such as maximum likelihood estimation will be discussed.

During the seminar I will make use of a quite flexible latent variable modelling software package I developed, the Latent GOLD program.

### Biografía breve

Jeroen K. Vermunt received his PhD degree in social sciences research methods from Tilburg University in the Netherlands in 1996. He is currently a full professor and head of the Department of Methodology and Statistics at Tilburg University. In 2005, he received the Leo Goodman early career award from the methodology section of the American Sociological Association, and in 2010 he obtained a prestigious Vici grant from the Netherlands Science Foundation. His work has been published in the main journals in statistics and social science methodology, as well as in applied social science journals, including marketing journals. His research interests include latent class and finite mixture models, IRT modeling, longitudinal and event history data analysis, multilevel analysis, and generalized latent variable modeling. He is the co-developer (with Jay Magidson) of the Latent GOLD software package.