

# 23rd EBES CONFERENCE - MADRID PROGRAM AND ABSTRACT BOOK

### SEPTEMBER 27-29, 2017 MADRID, SPAIN

HOSTED BY



## FACULTY OF ECONOMICS AND BUSINESS UNIVERSIDAD COMPLUTENSE DE MADRID

SPONSORED BY



ebes@ebesweb.org www.ebesweb.org due to bureaucracy, they do not apply for the support. In addition, there are some systemic restrictions, which limit flexibility of the cooperation and long term planning.

Keywords: Labor Market Policy, Efficiency, Labor Demand, Public Employment Services

### **CORPORATE FINANCE I**

**Room:** 316

Chair: Michi Nishihara

The Impact Size of Financial Information on Return on Equity: DuPont Approach

Hakan Aygoren

Pamukkale University, Turkey

**Umut Uyar** 

Pamukkale University, Turkey

Goksal Selahatdin Kelten

Pamukkale University, Turkey

### **Abstract**

In this paper, it is aimed to find out the impact size of financial information on the firms' Return on Equities (ROE). To conduct the analysis, 54 firms traded in Borsa Istanbul are selected from several sectors such as metal, textile and cement industries. The dispersion of the firms are as follows; 16 from metal, 12 from textile and 26 from cement industry. The data used in analysis gathered from Bloomberg Terminal Database for the period 2012-2016, annually. To determine the impact size of financial information on ROE financial ratios of Dupont Analysis; Profit Margin, Asset Turnover and Financial Multiplier, i.e. Financial Leverage; are used as the input variables whereas ROE is considered as the output variable. In accordance with the purpose of study, Support Vector Machine (SVM) methodology is applied to the data. SVM regression models have been employed for modeling nonlinear dynamics for various purposes successfully due to their peculiar properties namely high generalization capability and the assurance of global minimum. Based on the Statistical Learning theory and the Structural Risk Minimization principle. SVM approaches solve any regression problems by transforming the regression problem into a quadratic programming problem. Recently, SVM-based algorithms have been developed very rapidly and have been applied to many areas. The results of the analysis show that the impact size of Profit Margin, Asset Turnover and Financial Multiplier variables differs sector-by-sector. Such that Financial Multiplier has the highest impact size on ROE in metal industry whereas Asset Turnover has the highest impact size on ROE in both textile and cement industries. The outcomes of the study can help to shape strategic plans (such as capital structure, capital budgeting decisions) of policy makers from different sectors.

**Keywords:** Dupont Analysis, Support Vector Machine, Strategic Financial Planning, Borsa Istanbul