ABSTRACT
This paper investigates the relationship between cultural globalization and economic growth in the case of Portugal over the period of 1995-2008 using panel data. Our empirical evidence reveals that the initial GDP per capita is negatively correlated with economic growth. This paper shows that international trade and cultural globalization promote economic growth.

Key Words: Portugal, Convergence, Globalization, and Economic growth.

INTRODUCTION
In general, globalization is often analyzed in terms of costs versus benefits. There are several studies which claim that globalization promotes economic growth (Celik and Basdas, 2010; Dreher, 2006; Leitão, 2012b). Globalization promotes inequality between countries is reported by Goldberg and Pavcnik, (2007); Milanovic, (2005); Wade, (2004); Heshmati and Lee, (2010); Shahbaz and Islam, (2011); Hamori and Hashiguchi, (2012).

This paper examines the relationship between cultural globalization and economic growth using a panel data for the period 1995-2008 between Portugal and the European Union countries (EU-27). The openness trade, foreign direct investment and globalization must be explained in the context of endogenous models of economic growth. In fact the assumptions of monopolistic competition introduced new explanatory variables to the study of economic growth (see Grossman and Helpman, 1991; Rebelo, 1991; Romer, 1986). Similarly, Dreher, (2006); Leitão, (2012b) found that globalization promotes economic growth. Moreover, Beer and Boswell, (2001); Mah, (2002); Goldberg and Pavcnik, (2007) reported that globalization are positively correlated with inequality. Dreher, (2006); Leitão (2012b); Celik and Basdas, (2010) found that there is a correlation between globalization and economic growth.
Dreher, (2006) demonstrated that a causal relationship between globalization and economic growth using globalization indicators proposed by Kearney, (2003) and KOF index by Dreher, (2006). The index of globalization (KOF) proposed by Dreher, (2006) represents three dimension of globalization: economic, social and political globalization (see Dreher, 2006; Dreher and Gaston, 2008). We used only the cultural globalization. This index is interpreted as the domination of American products (Dreher, 2006). The data on cultural proximity are the number of McDonald's restaurants. There is some robust evidence that international trade is positively correlated with economic growth (Grossman and Helpman, 1991; Rebelo, 1991; Frankel and Romer, 1996; Nasreen, 2011; Shahbaz, 2012). Recently, Lai et al. (2006); Onaran and Stockhammer, (2008) found a negative association between openness trade and growth.


**ECONOMETRIC MODEL**

The dependent variable is the real GDP per capital of Portugal over the period of 1995-2008. The data is taken from World Bank. The partners selected are European countries (EU-27).

The paper uses following explanatory variables in logs:

- **GDP**: It is the initial level of GDP per capita. Barro, (1991); Dreher, (2006) considered a negative correlation between economic growth and the intial level of GDP per capita, i.e there is a economic convergence. The income measure selected in this research is the gross domestic product per capita, expressed in constant 2000 US$ and was collected from World Bank.

- **KOFCULT**: This is cultural globalization proposed by Dreher, (2006); Dreher and Gaston, (2008). The data on cultural proximity are the number of McDonald’s restaurants per capita. The expected effect on growth is positive. Dreher, (2006); Leitão, (2012b) found a positive correlation between globalization and economic growth.

- **TRADE**: This is international trade (exports plus imports between Portugal and trade partner). The data for trade were collected from National Institute of Statistics. Grossman and Helpman, (1991); Rebelo, (1991) found positive relation between both variables.

- **FDI**: It is the net inflows of investment. The data are collected from World Bank. The studies of Kai and Hamori. (2009); Badinger and Tondl, (2002); Onaran, (2007); and Leitão (2012a) find a
positive impact of foreign direct investment on growth.

- INF (Inflation): this is measured by the consumer price index and reflects the annual percentage change in the cost to the average of acquiring a basket of goods and services that may be fixed or changed at specified intervals, such as yearly. Gillman and Kejak, (2005); Fountas et al. (2006) reported a negative relation from inflation to economic growth.

We also introduced Probit model to evaluate the expected signs. The econometric model on growth takes the following representation:

$$\ln Growth = \beta_0 + \beta_1 \ln(GDP) + \beta_2 \ln(KOFCULT) + \beta_3 \ln(TRADE) + \beta_4 \ln(FDI) + \beta_5 \ln(INF) + \delta t + \eta_i + \epsilon_i$$

**EMPIRICAL RESULTS**

Table-1 presents OLS estimator with time dummies and Probit model. For OLS estimator the general performance of model is satisfactory. Regarding the traditional hypothesis, signs of two models are consistent with our expectation.

<table>
<thead>
<tr>
<th>Independent Variables</th>
<th>OLS</th>
<th>Probit</th>
</tr>
</thead>
<tbody>
<tr>
<td>lnGDP</td>
<td>-0.96 (-2.64)**</td>
<td>-21.36 (-10.94)***</td>
</tr>
<tr>
<td>lnKOFCULT</td>
<td>0.13 (1.86)*</td>
<td>0.102 (6.72)***</td>
</tr>
<tr>
<td>lnTRADE</td>
<td>0.23 (2.70)***</td>
<td>10.06 (9.27)***</td>
</tr>
<tr>
<td>lnFDI</td>
<td>0.007 (2.44)**</td>
<td>0.04 (0.04)</td>
</tr>
<tr>
<td>lnINF</td>
<td>-0.006 (-1.80)*</td>
<td>-1.95 (-3.94)***</td>
</tr>
<tr>
<td>Constant</td>
<td>1.41 (2.61)*</td>
<td></td>
</tr>
</tbody>
</table>

**Note:** (Heteroskedastic-consistent for OLS) standard errors are errors are in brackets. ***, ** and * indicate significance of at 1, 5, and 10 per cent levels respectively.

The variable of initial of GDP per capita (lnGDP) is statistically significant at 1% level, indicating that there is an economic convergence. We expected that cultural globalization (lnKOFCULT) has a positive sign on economic growth. The result is similar with Dreher, (2006) and Leitão, (2012b). Our result indicates that international trade promotes the economic growth. Foreign direct investment (lnFDI) also stimulates economic growth. The variable inflation (lnINF) finds a negative sign, as we expected and corresponds to the empirical works as in Gillman and Kejak, (2005) and Fountas et al. (2006).
CONCLUSIONS

This paper investigates the relationship between cultural globalization and economic growth for the period 1990-2008 between Portugal and European Countries. There appears to be a positive and statistically significant impact of cultural globalization on economic growth. The bilateral trade expresses promotes economic growth. Inflation retards economic growth and foreign direct investment leads economic growth.

This study contributes in several ways. Firstly, the paper examines the impact of cultural globalization and economic growth. Secondly, the results allow us to view cultural globalization as a vehicle that promotes to increase of economic growth. For future research, we need to introduce a dynamic panel data (GMM-System) proposed by Blundell and Bond, (2000) with the aim to solve the endogeneity and serial autocorrelation.

REFERENCES


APPENDIX

Table-2: Correlations between variables

<table>
<thead>
<tr>
<th>Variables</th>
<th>lnGrowth</th>
<th>LnGDP</th>
<th>LnKOFCULT</th>
<th>LnTRADE</th>
<th>lnFDI</th>
<th>lnINF</th>
</tr>
</thead>
<tbody>
<tr>
<td>lnGrowth</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>lnGDP</td>
<td>-0.25</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>lnKOFCULT</td>
<td>0.08</td>
<td>0.48</td>
<td>1.00</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>lnTRADE</td>
<td>0.35</td>
<td>0.06</td>
<td>0.30</td>
<td>1.00</td>
<td></td>
<td></td>
</tr>
<tr>
<td>lnFDI</td>
<td>-0.06</td>
<td>0.15</td>
<td>0.01</td>
<td>-0.17</td>
<td>1.00</td>
<td></td>
</tr>
<tr>
<td>lnINF</td>
<td>0.26</td>
<td>0.13</td>
<td>0.53</td>
<td>0.55</td>
<td>-0.02</td>
<td>1.00</td>
</tr>
</tbody>
</table>

Table-3: Summary statistics

<table>
<thead>
<tr>
<th>Variables</th>
<th>Mean</th>
<th>Std. Dev.</th>
<th>Min</th>
<th>Max</th>
</tr>
</thead>
<tbody>
<tr>
<td>lnGrowth</td>
<td>-0.01</td>
<td>0.17</td>
<td>-2.32</td>
<td>0.03</td>
</tr>
<tr>
<td>lnGDP</td>
<td>2.24</td>
<td>0.06</td>
<td>2.12</td>
<td>2.32</td>
</tr>
<tr>
<td>lnKOFCULT</td>
<td>1.72</td>
<td>0.14</td>
<td>1.60</td>
<td>1.94</td>
</tr>
<tr>
<td>lnTRADE</td>
<td>1.71</td>
<td>0.26</td>
<td>1.12</td>
<td>1.87</td>
</tr>
<tr>
<td>lnFDI</td>
<td>3.84</td>
<td>1.05</td>
<td>-0.02</td>
<td>5.97</td>
</tr>
<tr>
<td>lnINF</td>
<td>1.03</td>
<td>0.21</td>
<td>0.65</td>
<td>1.48</td>
</tr>
</tbody>
</table>

Figure -1: Plot of Dependent Variable: lnGrowth