#### **EXTENDED ABSTRACT**

# THE IMPACT OF ECONOMIC GROWTH ON UNEMPLOYMENT IN SRI LANKA

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### **Abstract**

The concepts of economic growth and unemployment are the most important variables in the sense that all economies are choosing and implementing economic policies. The purpose of this study to investigate the relation between economic growth and unemployment in Sri Lanka for the time 2001–2020. Here the economic growth rate was used as the independent variable and the unemployment rate, the dependent variable. A simple linear regression model was developed to identify the relationship between economic growth rate and unemployment. It was found that there was a negative relationship between the independent and the dependent variable. The finding of the simple linear regression model was U = 6.066 - 0.072EGR. Thus, when economic growth rate increased by 1%, unemployment decreases by 0.072. Several suggestions that can be made based on the findings. That is, Sri Lanka needs to adopt the necessary policies and actions to reduce unemployment in order to achieve high economic growth. Reducing unemployment will reduce inequality, poverty and enable us to achieve high economic growth in the long run.

Keywords: Economic growth rate, unemployment, Sri Lanka

### 1. Introduction

Employment plays a main role in the sustainable economic development of any country. When the relationship between the economic growth and the unemployment rate are examined between 2000-2020 years in Turkey it is observed that there is an inverse relationship between economic growth and unemployment especially during crisis period (Day10ğlu and Aydin, 2020). But the impact of unemployment on economic growth has been a long-term elementary problem in economics. Specially in Sri Lanka, as a developing country, this situation can be clearly identified. Accordingly, it is important for a country to understand the relationship between unemployment and economic growth rate as it moves towards sustainable economic growth. It is also important to focus on this in policy making as well as economic decision making in a country like Sri Lanka. Economic growth rate can be simply defined as percentage vary in the cost of the entire goods and services produced in a country throughout a specific period of time, as compare to a previous time period. Unemployment is also defined as the mentioning to persons who are employable and enthusiastically seeking an occupation but is unable to find one (International Labour Organization, 2009). This group also includes those individuals in the labour force who are working but don't have a suitable job. With the transformation of Sri Lanka into an open economy in 1977, unemployment began to increase gradually (Gunarathna, 2007).

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Different investigators have also studied the relationship between economic growth rate and unemployment in various countries based on different time periods. Accordingly, Misini (2017) has studied the relationship between Kosovo's economic growth and unemployment for the period 2004-2014. It has been originated that there is a negative relationship between economic growth and unemployment. Chuttoo (2020) studied the long-term and short-term relationship between economic growth and unemployment in Mauritius. It has been identified that there is a negative relationship among economic growth and unemployment in the short and long term. Also, Nagel (2015) was studied the relationship among economic growth and unemployment and has been identified that there was a negative relationship. Furthermore Shahid (2014) studied the relationship between economic growth rate and unemployment in Pakistan 1980-2010 and identified that there was a negative relationship. Although there are most of researches done on unemployment and economic growth in different time periods, but there have not focused on the relationship between economic growth and unemployment in Sri Lanka, focusing on the period 2001-2020.therefore, this study was conducted to fill that research gap. Accordingly, this research has studied the relationship between economic growth rate and unemployment in Sri Lanka during the period 2001-2020. It provides some guidance on the implementation of policies and strategies to achieve sustainable economic growth. It also provides an understanding of the relationship between economic growth rate and unemployment and how to control unemployment for economic growth.

# Methodology

The main purpose of this research is to study the relationship between economic growth rate and unemployment in Sri Lanka for the period 2001-2020. Accordingly, data about the economic growth rate and unemployment rates for 2001-2020 were collected based on the annual Central Bank Reports of Sri Lanka. The simple linear regression model was used to study the relationship between economic growth and unemployment.

The model of simple linear equation is,

$$\gamma = \beta 0 + \beta 1 + \epsilon$$

Therefore, the simple linear regression model can also be used by applying this first formula. Here the dependent variable is Unemployment, denoted by 'U' and the independent variable Economic Growth Rate is denoted by 'EGR'. By making use of the dependent variable and the independent variable, the model will be

$$U = \beta 0 + \beta 1 EGR + \epsilon$$

These symbols represent, U- Unemployment and EGR- Economic Growth Rate

## 3. Results and Discussion

The findings of the analysis to identify the relationship between economic growth rate and unemployment for the years 2001 -2020, whereas for real GDP we have data only for the time period are as follows 2001- 2020.

**Table 1.** The descriptive statistic of economic growth rate and unemployment

Variable	Observations	Std.Dev	Mean	Min	Max
Unemployment	20	1.63	5.73	4	8.8
Economic Growth Rate	20	3	4.64	-3.6	8.3

This table provides information on economic growth rate and unemployment. It consists of 20 observations, where general unemployment in average is 16%, with standard deviation of 1.6%, whereas the minimum value of unemployment is 4%, and the maximum is 8.8%. The mean of economic development rate is 4.64 and the standard deviation is 3.

**Table 2.** The results of simple linear regression.

Sourse	df	SS	MS		20 Observations
Regression	1	.898	.898		F = 0.328
Residual	18	49.324	2.740		Prob > F = .024
Total	19	50.222			R = .134
					R Square = .018
					Adj. R Square =037
U	Coefficient	Std.Err.	t	Sig	95% Conf.Interval
cons	6.066	.694	8.744	.000	4.608 7.523
EGR	072	.127	572	.024	338 .193

Source: SPSS Output

This table provides information about the relationship between economic growth rate and unemployment. Thus, it can be identified that there is a negative relationship between economic growth rate and unemployment. Accordingly, the simple linear regression model can be constructed as follows.

$$U$$
= 6.066-0.072 $EGR$ 

From this finding the ordinate in origin (Y- intercept) of the assessed regression line 6.066, whereas economic growth rate is 0.072. It also observed that whether economic growth rate which was the independent variable used, is statistically significant. Since it is (P < 0.05) or (0.024 < 0.05) relative to economic growth rate, it can be said to be statistically significant. According to the findings that make it clear, when economic growth rate increases by 1%, unemployment falls by -0.072.

## 4. Conclusion

As unemployment rises, inequality grows spontaneously. Also, inequality and unemployment have a negative impact on economic growth rate in the long run. This study identified that the relationship between economic growth rate and unemployment in Sri Lanka for the period 2001–2020 is a negative relationship. Accordingly, it is important for the government to take the necessary actions to reduce unemployment through policies and programs implemented to achieve economic growth. This is because focusing on reducing unemployment reduces inequality among individuals. It also reduces poverty and migration. Furthermore, it will reduce labour migration and boost economic growth in the long run through increased employment. In order to reduce unemployment or to increase employment, a government must formulate and implement a strong policy framework. It is important to focus on planning to increase foreign investment, creating a new industrial city, locating people for jobs suitable for education, providing facilities and assistance to institutions with large-scale employment, and encouraging self-employment.

## References

Chuttoo, U. D. (2020). Effect of Economic Growth on Unemployment and Validity of Okun's Law in Mauritius. Global Journal of Emerging Market Economies 12(2): 231-250.

- Dayıoğlu, T. and Aydın, Y. (2020). Relationship between Economic Growth, Unemployment, *Inflation and Current Account Balance: Theory and Case of Turkey* 1-16.
- Gunarathna, K. M. L. M. M. (2007). Open economy in a tense situation; Sri Lanka's experiences. In *Proceedings of the 11th International Conference on Sri Lanka Studies*.
- ILO. (2009). International Labour Organization. Labour Statistics Yearbook, Geneva.
- Misini, S. (2017). The Effect of Economic Growth in Relation to Unemployment. *Journal of Economics and Economic Education Research* 18.
- Nagel, K. (2015). Relationships between unemployment and economic growth the review (results) of the theoretical and empirical research. *Journal of Economics and Management* 20(2): 64–78.
- Shahid, M. (2014). Effect of Inflation and Unemployment on Economic Growth in Pakistan. *Journal of Economics and Sustainable Development* 5 (15): 103-106.