SCOS INDEXATION METHODS. THEORY AND PRACTICE





The Methodological Support Division of European Social Fund Agency collected theoretical aspects and practical examples on simplified cost options (hereinafter – SCOs) adjustment methods and prepared the short Guidelines "SCOs indexation methods. Theory and practice".
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THEORETICAL ASPECTS OF SCOs INDEXING

Common Provisions Regulation (hereinafter - CPR)1 does not include any provision on the adjustment of simplified cost options. Therefore, adjustment is not compulsory. However, it is recommended that the managing authority adjusts the simplified cost options (hereinafter SCOs) when launching a new call for proposals or does so periodically in order to take account of an indexation or economic changes, e.g. in energy costs, levels of salaries, etc. The Commission suggests enshrining in the methodology some automatic adaptations, for instance, based on inflation or evolution of salaries. Thus, the simplified cost option remains a reliable proxy of real costs (Guidance on Simplified Cost Options (SCOs): Flat rate financing, Standard scales of unit costs, Lump sums²).

Indexation is defined as the automatic adjustment of wages, taxes, pension benefits, interest rates, etc., according to changes in the cost of living or another economic indicator, especially to compensate for inflation3. Adjustment may be applied to update costs from previous years to current prices.

Indexation a given price or payment to other prices can serve two main purposes:

- to maintain a stable relative price between two or more goods or services;
- to maintain a stable real price of a good or service relative to the purchasing power of a currency unit.

The primary reason why indexation is beneficial is to offset inflation and the main purpose of the indexation or adjustment of SCOs – is to have the best possible approximation. Indexation can be classified in different ways.

Firstly, indexation can be classified by the types of expenditures to three categories:

- Wage indexation. Formal wage indexation can be defined as the presence of clauses in laws or contracts whereby wages (either public or private) are to a large degree automatically linked to price developments.
- Price indexation is used for inflation compensation. Price adjustment addresses problems and can protect from high price fluctuations. Price adjustment allows to offer more realistic prices.
- Mixed price / wage indexation could be used for different categories of costs indexation.

Also, it can be distinguished several types of indexation:

- · Historical indexes;
- Regular, not specified indexation (ex., according to conditions of Legal acts);
- Forecast indexes.

The traditional ones most often used types for SCOs indexation – historical indexes and regular not specified indexation. One method that is not used very widely for SCO indexation – forecast indexes. There is no single adjustment formula that encompasses every situation. Different formulas and methods can be applied for SCO indexation. The choice of index will depend on what is being measured. The cost of labour, for instance, may be affected by various factors including, but not limited to, general inflation in the country and exchange rate fluctuation.

Regulation (EU) 2021/1060 of the European Parliament and of the Council of 24 June 2021 laying down common provisions on the European $Regional\,Development\,Fund, the\,European\,Social\,Fund\,Plus, the\,Cohesion\,Fund, the\,Just\,Transition\,Fund\,and\,the\,European\,Maritime,\,Fisheries\,and\,Fund\,Fund,\,Fisheries\,Fund,\,Fi$ Aquaculture Fund and financial rules for those and for the Asylum, Migration and Integration Fund, the Internal Security Fund and the Instrument for Financial Support for Border Management and Visa Policy (Article 53 and Article 94).

- 2 Source: eur-lex.europa.eu/legal-content/EN/TXT/?uri=CELEX:52021XC0527(02)
- 3 Source: www.dictionary.com/browse/indexation

¹ Regulation (EU) No 1303/2013 of the European Parliament and of the Council of 17 December 2013 laying down common provisions on the European Regional Development Fund, the European Social Fund, the Cohesion Fund, the European Agricultural Fund for Rural Development and the European Maritime and Fisheries Fund and laying down general provisions on the European Regional Development Fund, the European Social Fund, the Cohesion Fund and the European Maritime and Fisheries Fund and repealing Council Regulation (EC) No 1083/2006 (Article 67);

Indexes are used to show increases in any of these elements that affect the price of the identified component. Potential indexes include:

- Local price indexes, applicable according to costs covered by SCO, such as retail price index, consumer price index, minimum wages, or labour rates, regulated prices, etc., provided by, for example, the country statistics office.
- · International indexes, sourced from reputable organizations and widely used by the business community. The sources of indexes must also be related to the source of foreign inputs and currencies of payment.
- · Comparable indexes, where acceptable local or international indexes are difficult to find, indexes of similar commodities used internationally or those from neighbouring.

Different indexation methods are used for SCOs adjustment. It depends on what costs are covered by the SCO. In order to more precisely describe the methods that are used for SCO adjustment, some practices were collected about the adjustment methods and ways that are used in practice for different SCOs adjustment. After analysing the examples of countries, the most often used tools for indexation were divided to four categories (see Table 1).

Table 1. Indexation tools for SCOs adjustment

Source: prepared by Methodological Support Division.

Indexes	Changes of national legislation	Changes in EU legislation	Publication of new statistical data
 Consumer price index (CPI) for specific country Harmonized consumer price index (HCPI) Inflation rate OECD Total CPI index Labour cost index (LCI) Monthly wage index Construction cost index 	 Minimum wage growth Amount of the basic social allowance Basic amount of official salary Changes in the legal acts regulating the employer's taxes (social insurance contributions) Changes in the legal acts, where set amounts of accommodation and subsistence allowances Changes of VAT rate 	Changes in Erasmus+ Program Guide Changes in Delegated Regulation	 Public expenditure on education per pupil/ student based on FTE by education level and program orientation Fuel prices Average monthly salary in particular sector

PRACTICAL EXAMPLES ON SCOs INDEXATION

It can be excluded four most often used indexation methods, three of them - based on historical index evaluation and one - based on changes in national and European Union legislation:

- 1. Wage cost indexation (see Table 2);
- 2. Price indexation (see Table 3);
- 3. Mixed price / wage (see Table 4);
- 4. Regular, not specified indexation (see Table 5).

Table 2. Practical examples of usage Wage cost indexation method

What categories of costs are covered by SCO	Indexation method	Periodicity
	Based on the data of the average gross salary of workers in the social sector for the period 3Q(N-1) to 2Q(N).	Once a year
Waga agata	Automatic adjustment by 2.4 % every 12 months. The percentage is based on the average increase in salaries according to official national statistics for the past five years.	Every 12 months
Wage costs	The Unit Costs for Direct Personnel Costs may be updated annually by the GEP, based on new statistical data from the Personnel Tables and the Earnings Structure Survey, referring to years after 2020.	Annually
	Adjustment using monthly wage (gross) index, compared to previous year.	Every year once a year until the end of Q2

Table 3. Practical examples of usage Price indexation method

What categories of costs are covered by SCO	Indexation method	Periodicity
Equipment costs, costs of different goods or services	SCOs are adjusted according to the (public) information on the Consumer Price Index (CPI) provided by the Statistics, compared to previous years (according to the COICOP classification (selected specific category, for example, 5.3. "Household appliances, or general category – 00 "Consumer goods and services").	Once a year until the end of I quarter of year N
Tuition and bench fees for study programmes	The SCOs will be adjusted in line with the cost of inflation at a national level. The rates of inflation are published by the National Statistics Office on an annual basis.	Adjustment may be applied every year to new calls for applications once a new rate is published by the National Statistics Office. Such calls will include the relevant rates applicable.

Table 4. Practical examples of usage Mixed price / wage indexation method

What categories of costs are covered by SCO	Indexation method	Periodicity
P1 component of SCO, covering average exhibition space rental, exhibition registration fee, exhibition stand installation costs.	P1 component will be updated by indexing the total costs of each exhibition to the price level of the corresponding year, based on the OECD Total CPI index, which covers all countries.	
P2 component of SCOs, covering average wage costs, including costs for employer-employee obligations.	P2 component will be updated based on the data of the average monthly wage of the corresponding year of the Official Statistics Portal of the Private Sector with Individual Enterprises and assessing changes in legislation governing employer taxes.	Once a year
P3 component of SCO, covering average travel and living expenses of one participant (which consists of travel expenses, living space rental expenses and daily allowance expenses).	P3 component will be updated after the changes of: the Erasmus+ Program Guide and the Resolution No. 526 of Government of the Republic of Lithuania "On the payment of per diems and other expenses of official business trips".	

Table 5. Practical examples of usage Regular, not specified indexation method

What categories of costs are covered by SCO	Indexation method	Periodicity
Wage costs	Unit cost is adjusted if the amount of minimal monthly salary in Lithuania changes.	Changed after changes in legislation not later than one month after the change in the legal act
Internship scholarship costs	Is recalculated every time there is a change in the amount of the internship scholarship established in the Employment Law and the amount of the minimum monthly salary established in Lithuania	Changed after changes of legal acts not later than one month after the change in the legal act
Travel costs excluding hospitality and per diem	Rates may be adjusted in line with any adjustments published in the latest available version of the ERASMUS+ Programme Guide.	Frequency of adjustment and related adjustment trigger is subject to any circumstances or factors taken into consideration by the European Commission at the time.

Services costs	The unit costs are adjusted assessing the changed Value added tax (VAT) rate established in the VAT Law.	Changed after changes of legal acts not later than one month after the change in the legal act
Salary costs for annual leave for project staff, calculated based on the eligible and actual salary costs of the project staff.	The amounts of the flat rates are updated only when the legal acts regulating the procedure for granting and / or calculating annual leave are changed.	Changed after changes of legal acts not later than one month after the change in the legal act

All previously mentioned methods are based on historical indexes, it means that when the data is adjusted using historical indexes, data is recalculated to the N-1 price level, since the current year's data indexes are not published yet and it leads the situation that SCO is always one year behind the real price level in the country. Such methods for SCO adjustment are suitable in the stable economic situation, in the years of economic expansion, which is characterized by a growing gross domestic product (GDP), a decreasing unemployment rate, and low inflation.

When the inflation rates are growing up, such previously mentioned methods used for SCO indexation don't correspond to real market prices, which is also growing up very fast and, in such cases, it is faced with very high risk to successfully implement the activities. In the economic recession phase the macroeconomic projections and forecast indexations could be used for data recalculation to the current year's price level.

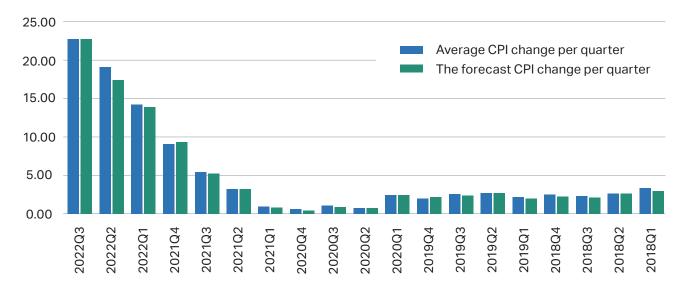
Macroeconomic projections aim to predict and understand the future state of the economy on a broad scale. They include information related to economic growth, inflation, wages, unemployment, and trade. For example, Euro system and European central bank (ECB) staff produce macroeconomic projections that cover the outlook for the euro area and the wider global economy. These contribute to the ECB Governing Council's assessment of economic developments and risks to price stability. Forecasts of macroeconomic indicators are prepared based on the assumptions of the international environment and other reliable data and information. The calculations are made considering different indicators and economic cyclicity. For example, Organisation for Economic Co-operation and Development (OECD) performing forecasts combine expert judgement with a variety of existing and new information relevant to current and prospective developments. The Bank of Lithuania also use different methods for calculating forecasted indicators. These include revised policy settings, recent statistical outturns and conjunctural indicators, combined with analyses based on specific economic and statistical models and analytical techniques. So, the methods used to calculate forecasted rates have strong scientific basis and methodology.

For the indexation of SCOs in the most cases the inflation forecast, or wage growth forecast can be used:

- Inflation forecast is measured in terms of the consumer price index (CPI) or harmonised index of consumer prices (HICP) for euro area countries, the euro area aggregate and the United Kingdom. Inflation measures the general evolution of prices. It is defined as the change in the prices of a basket of goods and services that are typically purchased by households. Projections are based on an assessment of the economic climate in individual countries and the world economy, using a combination of model-based analyses and expert judgement. The indicator is expressed in annual growth rates4.
- · Wage growth forecast is measured in terms of employment rates and gross domestic product growth. Also, the wage growth is affected by minimal monthly wage growth in the country and many other macroeconomic indicators.
- Source: www.oecd-ilibrary.org/economics/inflation-forecast/indicator/english_598f4aa4-en

Fig. 1. The comparison of average CPI change per quarter and the forecast of CPI change per quarter

Source: data.oecd.org/price/inflation-forecast.htm and osp.stat.gov.lt/statistiniu-rodikliu-analize#/



In order to make arguments in favour of this method, we carried out the analysis of the differences between actual Consumer price index and forecasted Consumer price index in Lithuania. The analysed period - 2018 Q1-2022 Q3. Analysis shown that only two times the forecast exceeds the actual inflation rate, it was 2019 Q4 and 2021 Q4, other times actual inflation rate exceeds forecast of consumer price index (see Fig. 1).

Table 6. The model of usage forecasted CPI for SCO adjustment

Year	The most often used method for indexation	Forecast indexes	1st adjustment	2nd adjustment
2016	Historical data	Historical data	Historical data	Historical data
2017				
2018				
2019	The actual CPI indexes are used	The actual CPI indexes are used		
2020	madadd ard adda		The actual CPI indexes are used	The actual CPI indexes are used
2021				
2022	Prepared methodo- logy with data re- calculated in 2021 years price level	Prepared methodology with data recalculated in 2022 years price level using forecasted index for 2022		
2023			Recalculated SCOs using forecasted index for 2023	
2024				Recalculated SCOs using forecasted index for 2024

For example, the data of 2016 is used for SCO calculation. For the adjustment the data to 2021 price level, the actual CPI are used, and the data is recalculated to 2021 years level. When in 2022 years by indexing the amounts to 2022 price level the inflation forecast for 2022 is used. In the 1st amendment of SCOs, in 2023, the amounts will be adjusted to 2023 price level, but the inflation forecast ratio of 2022 will be changed to the actual change in consumer prices of 2022 and then the SCO will be indexed based on the 2023 forecast again. And the same exercise will be performed every year for adjusting SCO in the future. The example of usage forecasted CPI is provided in Table 7.

Table 7. The example of usage forecasted CPI

What categories of costs are covered by SCO	Indexation method	Periodicity
Acquisition and installation (or replacement) costs of a hot water meter with remote data reading function.	 SCOs are updated under the conditions listed below: In 2023 recalculating amounts: The recalculation of 2021 years data indexation is performed, replacing OECD inflation forecast of 2022 in actual 2022 by the change in consumer prices, calculated according to the consumer price index, compared to the corresponding period of the previous year (according to the COICOP classifier "00 Consumer goods and services"), in this way the 2022 level data calculated based on the actual change in the CPI; then data of 2022 level are indexed to 2023 the price level, based on the data of the inflation forecast published by the OECD for the current year (in this case, 2023). The same sequence is maintained when recalculating SCOs in subsequent years as well. 	SCOs are updated every year, once a year until the 1st quarter.

This forecasted indexation method is the most suitable and useful when there is high inflation in the specific country or in the European Union in order to calculate the SCO average corresponding to the current price level.

Practical suggestions:

- 1. Different indexes and different indexing methods can be selected for SCO adjustment.
- 2. Indexes must be suitable for indexed costs, i.e., the index must correspond to the type of expenditures covered by SCO. If SCO covers wage costs, the index should measure wages changes - it can be used labour
- 3. When choosing indices, it is important to pay attention to the base year of index calculation, i.e., for consumer price index base year is 2015.
- 4. Some indices are presented as percentage changes over the comparable periods, so proper calculation of the index is important. For this purpose, the indexation coefficients can be calculated.
- 5. The indexing process should be clearly described and verified by the researcher.

The reliable data sources, where various historical or forecasted indexes can be found:

- 1. Eurostat ec.europa.eu/eurostat
- 2. European central bank www.ecb.europa.eu/home/html/index.en.html
- 3. World bank data.worldbank.org/
- 4. OECD statistics stats.oecd.org/
- 5. International monetary fund www.imf.org/en/Data
- 6. National central bank, for example, Bank of Lithuania www.lb.lt/lt/statistika
- 7. National Official statistics portal, for example osp.stat.gov.lt/

If you have any questions or suggestions, we are open to discussions and experience sharing: mpc@esf.lt



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