

# The Romanian Healthcare Institutions – Managing Budget Limitations and Liquidity Issues

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## Abstract

*The paper aims to determine if the public healthcare institutions in Romania (particularly in Constanta County) manage the budget limitations in terms of the level of incomes and expenditures, and if these institutions manage to insure the proper level of liquidity in order to satisfy the entity's creditors for exigible debts. In order to achieve these objectives, we calculated and analyzed the three indicators of liquidity (working capital - required working capital - net treasury) and in order to identify the degree to which the entity can cope with its short-term debts we used a system of liquidity rates. The findings of the research show heterogeneity in the management of the healthcare institutions and different situations in terms of achieving financial equilibrium.*

**Key words:** healthcare institution, liquidity, working capital, financial equilibrium

**J.E.L. classification:** I18, G00

## 1. Introduction

The management of the healthcare institutions represents a particular situation in exercising the management functions because the manager must consider all the principles of an effective management of the resources at their disposal without having the main objective of achieving a surplus (corresponding concept of profit) as in the case of a commercial company but to maximize the results of the activities developed (Gapenski, Louis C, 2007, 3).

Management must succeed primarily in maintaining equality between incomes and expenditures bearing in mind that for the public healthcare institutions the incomes, in their majority, are not a consequence of the carried out activity's efficiency but they have a value widely known, the amounts being allocated from the state budget.

On the other hand, the manager must monitor the spending of the income allocated without ignoring the possibilities of earning supplementary incomes, in which case the production process must be thought in the light of all economic considerations taken into account in the management of a company. In the last two decades the public healthcare institutions tended to become more independent in terms of resources finding, increasing the efforts to develop economic activities in order to obtain incomes to increase the amounts allocated from the state budget (Kulkarni at al., 2009, v).

For this reason, it is essential, for managerial decision making, that the decision-makers are able to analyze the financial structure of the entity, to follow the evolution of the results and to analyze the level and the significance of the liquidity indicators.

The objective of this paper is to determine if the public healthcare institutions in Romania (particularly in Constanta County) cope with the budget limitations in terms of incomes and expenditures, and if these institutions manage to insure the proper level of liquidity in order to satisfy the entity's creditors for exigible debts.

## 2. Research methodology

In order to achieve the objective of this research we analyzed two public healthcare institutions from Constanta County: CF Clinical Hospital Constanta and Techirghiol Sanatorium. The choice we made regarding the entities was based on the availability of the financial data necessary for the research and the profile of the institutions selected.

We used the financial data from the balance sheet and the result account of the entities for the 2009 – 2014 period.

The financial health of an entity can be assessed correctly and completely by analyzing the triad working capital - required working capital - net treasury.

These indicators underline the analysis liquidity-exigibility and represent important milestones for the management of institutions especially in the case of healthcare institutions financed from the state budget, and allow to take decisions on short, medium and long term so that its debts can be paid.

The working capital indicator is considered the most important indicator of the financial equilibrium as it makes the link between the two parts of the financial balance sheet showing the balance between long-term and short-term financing.

The degree to which the entity can cope with its short-term debts is given by a system of liquidity rates:

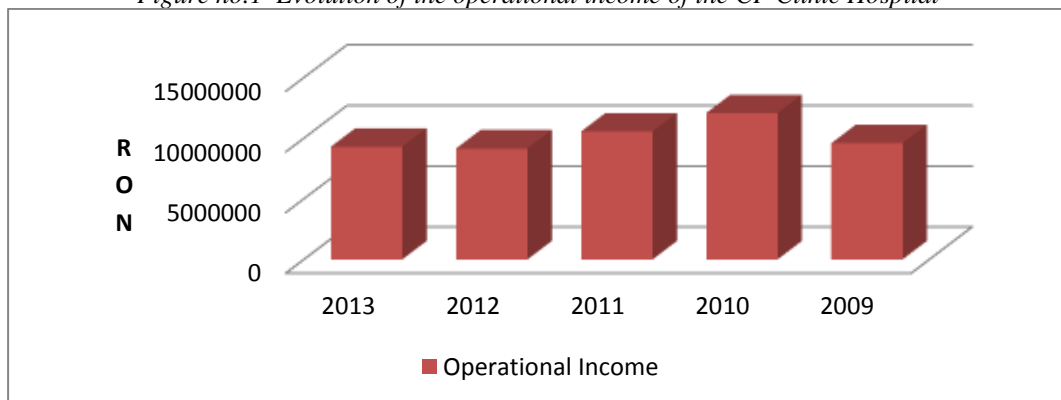
- Current liquidity rate (= Current Assets / Current Liabilities (with exigibility under one year));
- Reduced liquidity rate ((Current assets - Stocks) / Current Liabilities (with exigibility under one year)).

## 3. Income – expenditures – outcome – a comparative analysis

In this section we analyze and compare the incomes and the expenditures for the two healthcare institutions taken into consideration in order to observe if for the period selected they manage to maintain the equality between resources and needs following the budgetary limitation as public institutions.

Analyzing the results obtained by the CF Clinical Hospital for the period 2009-2013, as provided by the result account shows that, with the exception of 2011, the institution was unable to cover the costs with the income, income - expenditures equality as a goal of public institutions mainly financed from the state budget could not be reached.

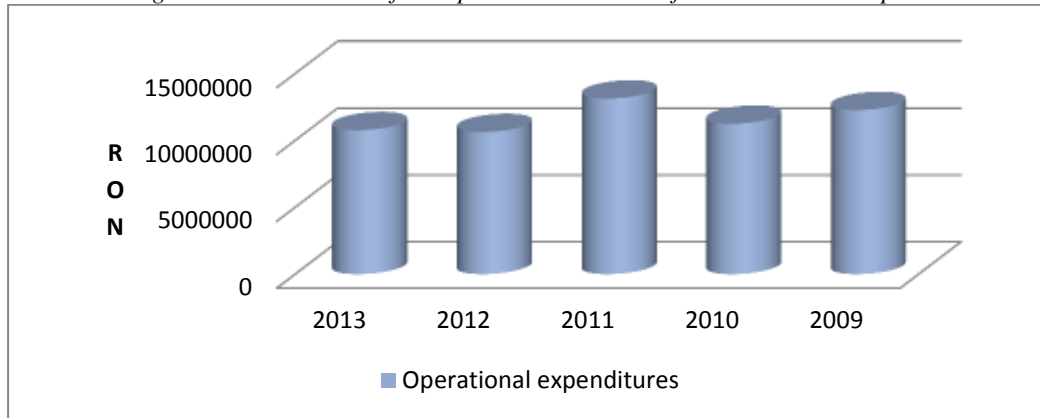
Figure no.1 Evolution of the operational income of the CF Clinic Hospital



Source: Authors' calculation based on the financials reports of the entity

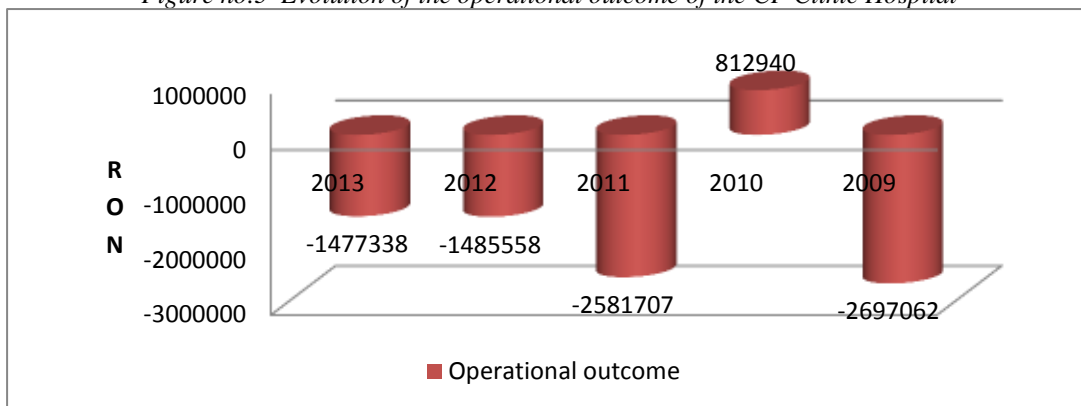
Incomes level and operational expenditures registered the hospital in 2009-2013 have led to a negative operating result in all the years analyzed, with the exception of 2010. The deficit of the hospital was more than 2,7 million lei in 2009 and a minimum 1.477 million lei in 2013. The only year the hospital recorded a surplus of 0.8 million lei was 2010 as shown in the figures below.

Figure no.2 Evolution of the operational income of the CF Clinic Hospital



Source: Authors' calculation based on the financials reports of the entity

Figure no.3 Evolution of the operational outcome of the CF Clinic Hospital



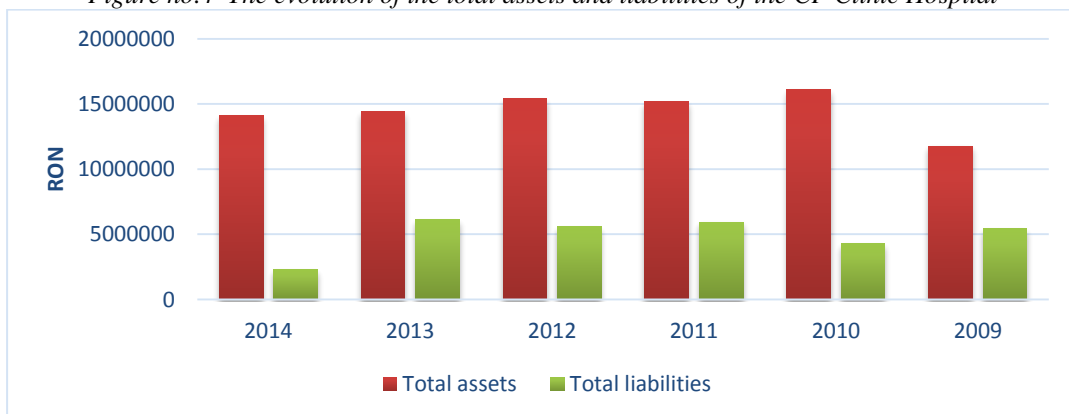
Source: Authors' calculation based on the financials reports of the entity

The analysis of the balance sheet components of the CF Clinical Hospital Constanta for the 2009-2014 period shows that the financial structure of this institution is not very strong marked by fluctuations in the assets value and the equity capital.

The entity enjoys relatively stable non-current assets while the current assets decreased during the period under review. That element is not necessarily a negative one because their reduction is largely due to the reduction of stocks which improves the financial situation of the institution because stocks are generating the extra costs.

A positive aspect to note is the significant reduction of the hospital debts in 2014 which helped increase equity capital value showing an improvement in the financial situation of the hospital.

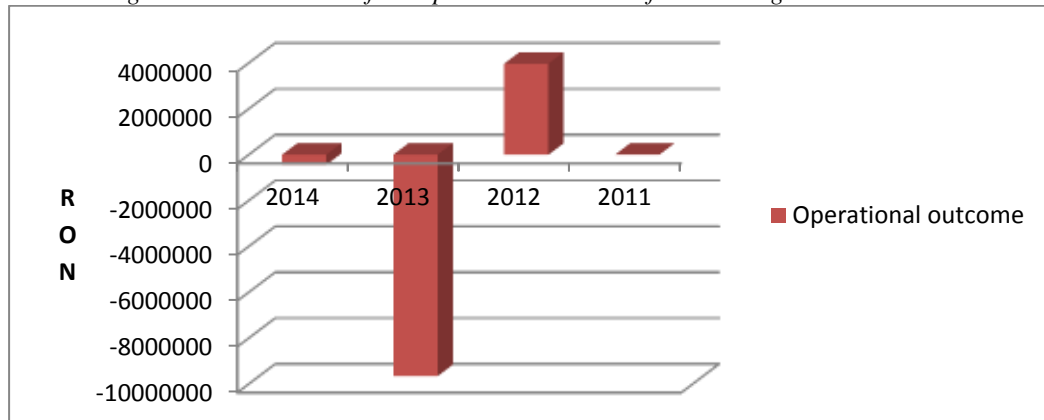
Figure no.4 The evolution of the total assets and liabilities of the CF Clinic Hospital



Source: Authors' calculation based on the financials reports of the entity

The analysis of the income and the operational expenditures of the Techirghiol Sanatorium, conducted during 2011 – 2014 period, indicates that the institution’s activity has registered a nonlinear evolution in terms of the operational outcome level. In the four years considered in the analysis it can be noted that in two years there was a deficit and a surplus in the other two. The deficit recorded in 2013 is the largest, of more than 9.5 million lei, while in 2014 it was reduced to less than a half million lei. 2012 was the year with the most effective activity recorded, with a surplus of nearly 4 million lei as shown in the figure below.

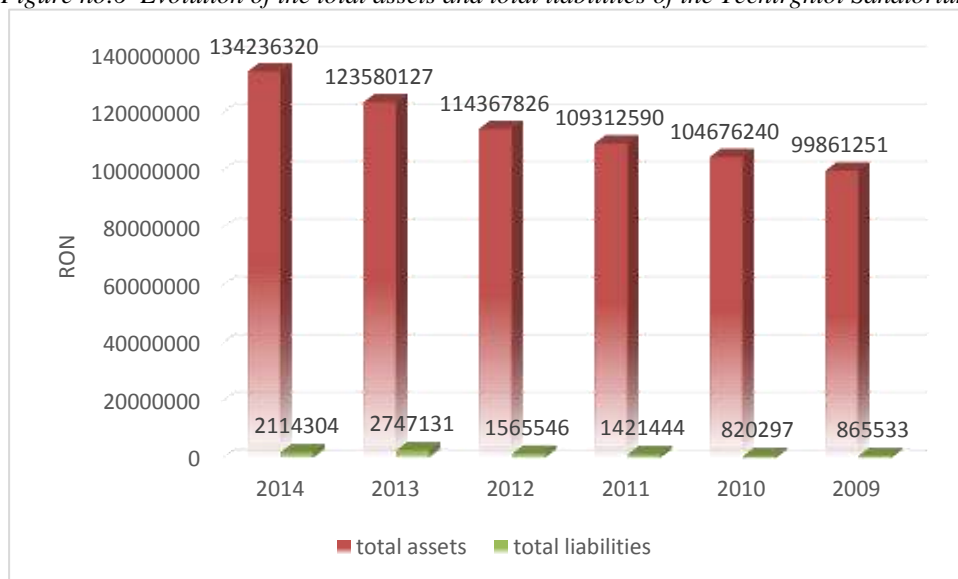
Figure no.5 Evolution of the operational income of the Techirghiol Sanatorium



Source: Authors’ calculation based on the financials reports of the entity

Although 2014 has brought the highest incomes for the sanatorium comparing all the four years analyzed, the strong growth of the expenditures has led the fiscal year to be ended in deficit.

Figure no.6 Evolution of the total assets and total liabilities of the Techirghiol Sanatorium



Source: Authors’ calculation based on the financials reports of the entity

The synthetic situation of the total assets and liabilities (shown in the figure above) recorded annually by the sanatorium show a favorable overall situation of the healthcare unit with an increasing trend of the total assets and a relatively stable level of debts but with a much lower value. Under these circumstances, the value of the equity capital has been growing steadily from nearly 99 million in 2009 to over 130 million lei in 2014.

#### 4. The liquidity triad and the liquidity rates

In order to assess the quality of the financial management of the two healthcare institutions we have conducted, for the 2009-2014 period, an analysis of the values and the evolution of a system of synthetic indicators used in the exigibility - liquidity analysis and two liquidity rates used in the financial analysis.

Based on the information from the financial reports for the two institutions we have calculated three indicators: working capital - required working capital - net treasury.

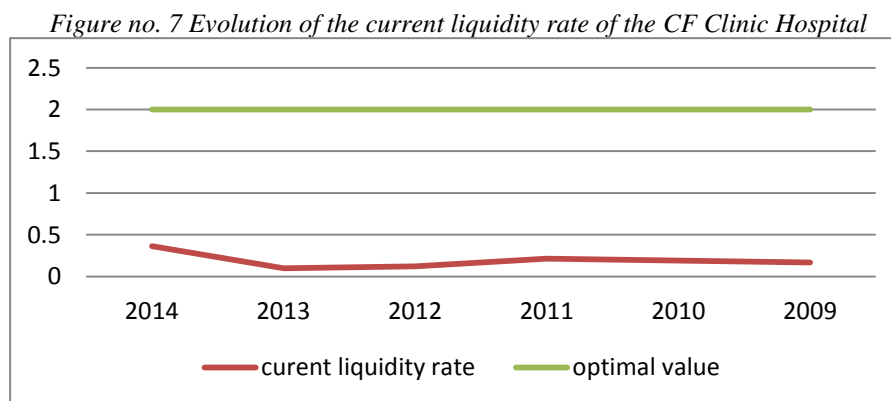
For the CF Clinical Hospital Constanta the analysis showed that the institution was in a financial disequilibrium as a negative working capital was registered for the entire analyzed period and proves that the hospital could not comply with one of the rules to ensure the financial health - permanent needs to be covered by permanent resources. In this case, a part of the permanent needs is covered by the temporary resources that are available because the temporary needs are less than the temporary resources, a situation proven by the positive value of the net treasury throughout the period.

Analyzing the indicator required working capital we can see that its value is negative for the entire period analyzed showing a surplus of the temporary resources, corresponding to the needs of circulating capital, or temporary needs smaller than temporary resources. This is a case frequently encountered in the case of entities with commercial activity due to the higher supplier loans compared to the customer loans. In this case, negative required working capital is a temporary source that should not be financed, but on the contrary, it will finance the working capital and treasury.

Following the analysis carried out to determine the general liquidity of Techirghiol Sanatorium we found that the synthetic indicators of the liquidity are all positive and with relatively stable values which indicate that the entity is characterized by financial equilibrium as the permanent resources are sufficient to cover the permanent needs and the temporary needs are greater than the temporary resources, but this situation is often seen for those entities providing services.

The analysis of the three liquidity indicators was completed by the calculation and the analysis of the current and reduced liquidity rates.

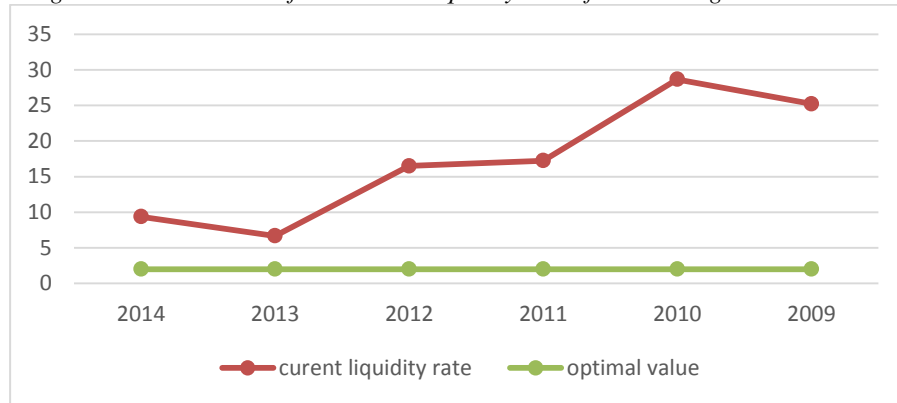
In the case of the CF Clinical Hospital Constanta we found that, throughout the analyzed period, the current liquidity rate is below par and with a nonlinear trend. By comparison with the level considered optimal level we note that they are much lower, as shown in the figure below.



Source: Authors' calculation based on the financials reports of the entity

The current liquidity rate for the Techirghiol Sanatorium is above par for the analyzed period. Comparing the values obtained with the level considered optimal we observe that they are much higher as can be seen in the figure below.

Figure no. 8 Evolution of the current liquidity rate of the Techirghiol sanatorium



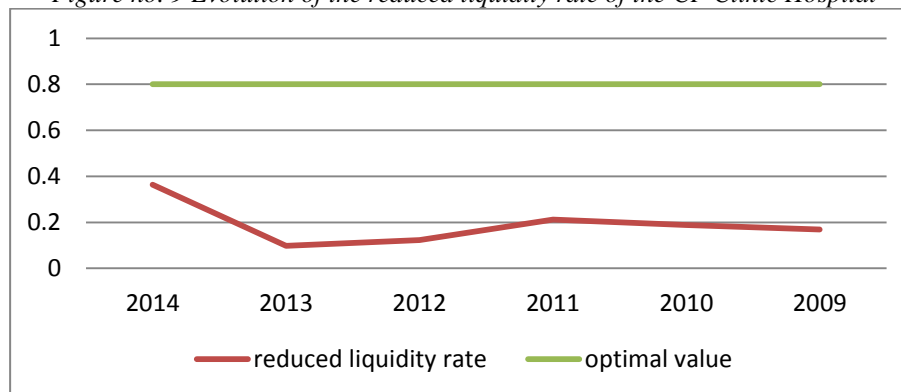
Source: Authors' calculation based on the financials reports of the entity

Regarding the analysis of the liquidity evolution is not sufficient that the ratio is above par, but its trend is necessary to be ascending. A descending trend of the liquidity rate illustrates a declining activity, and represents an indicator for creditors to be cautious in granting new loans.

Calculating the reduced liquidity rate for the CF Clinical Hospital Constanta for the period 2009 -2014 we noted that values are much lower than the minimum of 0.8 accepted by the literature as proof of a creditworthiness within normal parameters for a healthy economic activity, as can be seen in the figure below.

Values rate below unit highlights the fact that the stocks are financed by short-term debt.

Figure no. 9 Evolution of the reduced liquidity rate of the CF Clinic Hospital

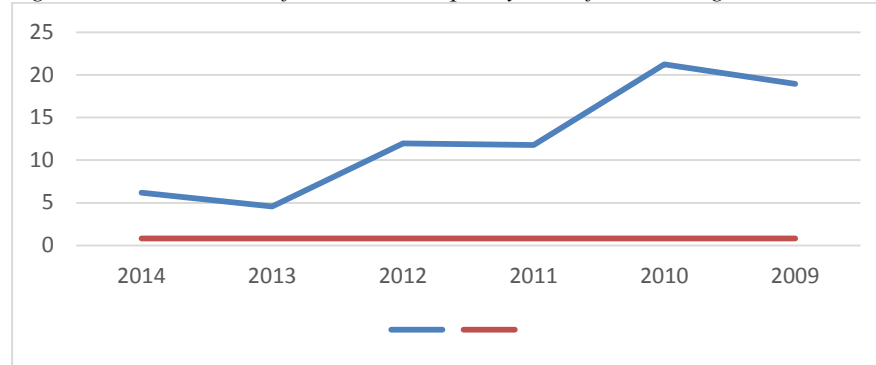


Source: Authors' calculation based on the financials reports of the entity

The reduced liquidity rate for the period by 2009 -2014 registered values above unit but that rate was declining. Comparing the values obtained with the level considered optimal by the specialists (between 0.8 and 1) we observed that they are much higher as it can be seen in the figure below.

Rate value above unit highlights that the stocks are not financed by short-term debt (or just by advance payments received from customers). In general, the report is below unit and does not cause difficulties, given that the institution has healthy stocks and correct cash flow forecasts.

Figure no.10 Evolution of the reduced liquidity rate of the Techirghiol sanatorium



Source: Authors' calculation based on the financials reports of the entity

The analysis of the two liquidity rates reveals different situations for the two healthcare institutions.

For the CF Clinical Hospital Constanta we have found, on the one hand, that their values were much smaller than those considered optimal and, on the other hand, their nonlinear evolution showed that the current activity of the healthcare unit from one financial year to another is conducted with syncope between receipts and payments and can be considered an alarming situation.

Analyzing the same two rates for the Sanatorium Techirghiol, the values obtained for current and reduced liquidity rates are above unit and much higher than the levels considered optimal so we can conclude that the sanatorium has the ability to pay its debts at maturity.

## 5. Conclusions

The overall conclusion we reached after the undertaken research is that the managerial approach to financial management for the institutions analyzed is different with different effects on the achieved results.

We can state that Techirghiol Sanatorium benefits from a proper financial management of adequate to the activity's particularities as the healthcare institution managed to ensure a financial equilibrium and sufficient liquidity to meet its financial commitments.

In the case of the CF Clinical Hospital Constanta we can appreciate that the institution's financial management can be improved in terms of a better timing of receipts and payments to permanently ensure the capacity to cover exigible debts. On the other hand, the deficit registered by the hospital in most years of the analysis shows that either the assigned incomes are insufficient for the expenditures caused by the human resource, materials and supplies necessary for carrying out the operational activity and it is necessary to increase them if the services provided by hospital justify it either it is necessary to resize the expenditures in line with the level of income.

To get a more comprehensive picture on how the healthcare institutions manages its resources future research will consider a greater number of institutions with different profiles.

## 6. References

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