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THE CANADIAN BASE PENSION PLAN FACING CONTEMPORARY CHALLENGES

The paper presents the current base pension plan operating in Canada. It describes each pillar of the Canadian pension scheme. The paper demonstrates that the benefits constitute a form of citizen's pension granted regardless of the years of service within the so-called state pension (OAS), which is granted to citizens after they reach a certain age. People are eligible for benefits after having at least 10 yearlong residency in Canada after turning 18, if they live in Canada. It also presents supplements to the pension available to the poorest pensioners. For the 1st pillar demographic factors are now the main source of threats. The article also presents the principles of the 2nd pillar (CPP), which is of redistribution-capital nature and which was seen by its creators as a supplement to the citizen's pension, allowing to achieve a 25% replacement rate with reference to the maximum income from which social insurance contributions were taken. Overachievements of the 2nd pillar enabled implementation of the capital component. The currently generated surpluses of incomes over expenditure in CPP allow to invest free resources in financial markets. The final part of the article present forecasts for the Canadian pension scheme, taking into account its base and supplementary parts. The significance of individual actions aimed at securing a source of income for the period following the professional career was emphasized.

Keywords: base pension plan, replacement rate, retirement benefits.

1. INTRODUCTION

A pension scheme is a type of a long-term contract in which a future pensioner, in return for the assurance of a source of income given by the scheme provider after their professional career is over, undertakes to put by certain amounts of money. This means that in return for limiting the current consumption of incomes, a scheme participant expects that during their retirement the scheme provider will assure they will receive income. The aim of pension schemes is to ensure financial security, whose degree is reflected in the replacement rate, that is the retirement pension to pre-retirement earnings ratio[3].

The origins of pension plans can be found in ancient times, where retirement benefits, mostly of one-off nature, were granted exclusively to soldiers, whereas pensions for workers appeared as late as in the 19th century. The current pension systems emerged in post-war

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years, though their beginnings were shaped at the turn of the 19th and 20th centuries. The first pension plan for German workers was created in the 1880s by chancellor Otto von Bismarck. In order to win the support of the working class voters, he guaranteed pensions to insured workers who reached the age of 70. Even though the average life expectancy at that time was 45 years, this assurance of financial security for the old age convinced many farmers to seeks employment in factories. A competitive system was developed in the first decade of the 20th century in Great Britain. Benefits offered by this system were a form of citizen's pension, allocated to those with the lowest incomes who reached the age of 70. The amounts of benefits offered by the state allowed them only to satisfy their very basic needs[4].

The contemporary demographic structure of population in developed countries is characterized by aging societies. This phenomenon poses a challenge since it forces governments to shape their long-term policies to ensure the balance of current pensions and stability of pension plans, whose condition is often reflected in the general condition of public finance in the country. The basic pension plans belong to the systems of social security and are created to ensure that the working people, their families and the people who retired receive benefits and pensions[5].

The aim of this article is to discuss the pension plan operating in Canada, to characterize its parts and to analyze its condition and prospects for the future, taking into account demographic and economic threats.

2. THE STRUCTURE OF THE CANADIAN PENSION SYSTEM

The pension system in Canada dates back to The Old Age Pension Act of 1927, which ensured pension benefits financed from the state and local budgets. The Old Age Security Act implemented in 1951 made provisions for the same size benefits depending on reaching the retirement age and living in Canada for at least 20 years after coming of age (18 years). At the beginning the retirement age was established at 70. Pensions paid in this system turned out to be too low and due to this in 1966 the Canada Pension Plan was implemented. It is an element of a universal system of social security which constitutes the second pillar of redistribution and capital nature.

The third pillar is purely capital and non-obligatory. Products offered within it may be based on individual contracts concluded by citizens and paid by them or programs financed by employers. The structure of the Canadian pension system was presented in Table 1 below.

The base part of the pension system in Canada consists of the I and the II pillars. The pension from the I pillar is financed from direct taxes. Within this part of the system pensioners may receive three types of payments, and they depend on pensioners' age, period of time they have lived in Canada and the level of incomes obtained by them, not on the period of professional activity. OAS pension is a monthly payment granted to a person who meets all the conditions specified below:

- they are over 65,

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4 *Ibidem*, pp. 3–6.

5 K. Tompalska, E. Złydaszyk, *Rola form dodatkowego oszczędzania w doubezpieczeniu emerytalnym* [w:] *Ubezpieczenia społeczna i finanse,* red. B. Kołosowska, D. Walczak, Toruń 2015, pp. 23–24.

- they have Canadian citizenship or are lawful permanent residents
- have lived in Canada for at least 10 years after turning 18[6].

Table 1. The structure of the pension system in Canada

I PILLAR	Old Age Security (OAS) – base pension Guaranteed Income Supplement (GIS) - an addition to the pension Allowance
II PILLAR	Canada Pension Plan (CPP)/ Quebec Pension Plan – pension from redistribution and capital pillar
III PILLAR	Registered Pension Plans Registered Savings Pension Plans Tax-Free Savings Accounts

Source: own elaboration.

In case of persons who want to receive this pension outside Canada, their previous stay in Canada must have lasted at least 20 years. The right to receive the base citizen's pension does not depend on the length of service. A person receiving the first pillar pension may still be employed or may never have worked. OAS is based on an assumption that during their lifetime each citizen somehow paid taxes and worked, even if they have not received any remuneration for that, therefore they are eligible for citizen's pension. The pension may be postponed for a period of 60 months – in such case it will be respectively higher. The amount of 100% of the OAS pension is granted to persons who have lived in Canada for 40 years, otherwise they receive a fortieth part of the base pension for each year of their residence in Canada.

In the first quarter of 2016 a monthly maximum amount of this pension was $ 570.52, while the upper annual income guaranteeing the pension will receive it was $ 119,398. An addition to this pension is GIS, eligible for people with low incomes. It is a kind of non-taxable allowance which may be received by persons residing in Canada. The third type of payment from the first pillar is the allowance, which is non-taxable. It is granted to married couples or partners. To benefit from it, a person must meet the following conditions:

- their age must be between 60 and 64 years,
- their spouse or partner must have the right to the base pension from OAS and to GIS supplement,
- they must have Canadian citizenship or stay in Canada legally,
- they must have lived in Canada for at least 10 years after their 18th birthday[7].

The amounts of benefits from I pillar and limit incomes entitling pensioners to receive them are presented in Table 2 below.

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[6] Canadian Institute of Actuaries, *Planning for retirement: Are Canadians Saving Enough*, 2007, pp. 1–3.

[7] *Old Age Security (OAS) – Eligibility*, 2016, http://www.esdc.gc.ca/en/cpp/oas/eligibility.page, (accessed: 22.01.2016).

Table 2. The amounts of pension benefits in 2016 paid within the I pillar

Type of benefit	**Maximum annual income (in $)**	**Maximum benefit (in $)**
Base pension from OAS	119398 (per person)	570,52
GIS (Guaranteed Income Supplement)		
single or divorced persons, widows and widowers	17304 (per person)	773,60
spouse or partner receives OAS pension	22848 (joint income)	512,96
spouse or partner does not receive OAS pension	41472 (joint income)	773,60
spouse or partner receives an allowance	41472 (joint income)	512,96
Allowance		
spouse or partner receives OAS pension and GIS	32016 (joint income)	1083,48
a single person whose spouse or partner has died	23328 (per person)	1213,00

Source: Own elaboration based on data from the Government of Canada, *Old Age Security payment amounts*, 2016, http://www.esdc.gc.ca/en/cpp/oas/payments.page (accessed: 22.01.2016).

Payments from the first pillar are subject to revaluation four times a year with Consumer Price Index (CPI). From April 2023 to January 2029 the retirement age enabling to receive the first pillar payments will be increasing. In case of the base pension and GSI the age will be increased from 65 to 67 years, the changes will affect people born after 1st April 1958. The age entitling to receive allowance will also increase during that time from 60 to 62 years. In 2013 the supplement (GSI) was used by 27.3% of women and 36.3% of men participating in the first pillar, whereas the allowance was received by 0.9% of women and 7% of men[8].

3. ECONOMIC AND DEMOGRAPHIC THREATS TO THE BASE SYSTEM

By far the factors exerting the biggest influence on the shape and situation of the first pillar and its operation in the future are all demographic and economic determinants. Society aging is reflected in the ration of people aged 20–64 to those aged over 65. Currently this ration is approximately 4.1, but the forecasts warn that in 2050 it will be around 2.2 Within two decades the number of beneficiaries using the base pension (OAS) will grow from 5.3 to 8.4 million. This phenomenon will be related to the retirement of people born in the post-war baby boom, which lasted until around 1965 in Canada. Similarly, the number of people receiving supplements to citizen's pension (GSI and allowance) will also grow. It is estimated that the above number will increase from 1.8 million now to 3.3 million. The ever-growing number of pensioners will lead to the increasing amounts of money for payments. According to the government estimates, they may grow from the current level of 33 billion dollars to 144 billion dollars in 2050. It is also worrying to observe the low total fertility rate, which fell from 4 in the 1950s to 1.6 at the end of the 1980s. Currently is has stabilized at the level of 1.63. The average life expectancy which has been growing since

[8] *Old Age Security (OAS)- Overview*, 2016, http://www.esdc.gc.ca/en/cpp/oas/index.page?_ga=1.10527228.930457323.1447442448, (accessed: 22.01.2016).

the 1960s will account for the fact that citizens will receive pensions for a longer period of time, therefore accumulated expenses per one person will grow, too. It is also estimated that the migration balance will fall from the current level of 0.77% to around 0.6% after 2017. Facing the negative consequences of the indicated phenomena, which pose a serious threat to the pension system which has been operating smoothly so far, the government is taking some action to fight the crisis in the first pillar, aimed mostly at extending the retirement age to 67 years[9]. The determinants affecting the condition of the pension system are presented in Table 3 below.

Economic factors refer to the share of professionally active people in the society and the growth of prices and salaries. The increased retirement age will allow to keep the level of labor for some time, this will also be supported by changes to employees' mentality, which are supposed to delay the retirement in the future. This is especially caused by the growing involvement in work and professional activity of women. According to estimates, the unemployment is to remain at the stable level of 6%, the real price growth will oscillate around 1.2%, while the inflation goal was established by Canada at 1%-3%. Real incomes obtained by citizens will grow faster than prices, which will be manifested in two ways. In the short run, tax revenues for the budget will grow faster than pension expenses, whose speed of change is determined by the Consumer Price Index (CPI). In the long run, bigger incomes will mean bigger payments to the 2nd pillar and potentially greater opportunities for saving some income in the 3rd pillar. When citizens' assets grow, the costs of the 1st pillar will decline[10].

Table 3. Forecasts concerning the first pillar of pensions

Average life expectancy:	women	men
of people born after 2013	89.1 years	86.1 years
of people aged 65 in 2013	23.3 years	20.9 years
Net migration ratio	0.60% (2017+)	
total fertility rate	1.65 (2015+)	
share of people aged 15-65 in the society	76.8% (2030)	
Unemployment	6% (2023+)	
Inflation	2.2% (2021+)	
Real inflation	1.2% (2020+)	

Source: own elaboration based on: Office of the Superintendent of Financial Institutions Canada, *12th Actuarial Report on the Old Age Security Program as at 31th December 2012*, 2014, p. 14.

4. THE CHARACTERISTICS OF THE II PILLAR – CANADA/QUEBEC PENSION PLAN

The second pillar has been operating in Canada since 1966. It is an element of the universal system of social security. Originally, the 2nd pillar was to operate as generation redistribution, however, changes to the demographic structure account for the fact that

[9] Office of the Superintendent of Financial Institutions Canada, *12th Actuarial Report on the Old Age Security Program as at 31th December 2012*, 2014, pp. 21–24.

[10] R. Brown, *Economic Security in an Aging Canadian Population*, Department of Statistics & Actuarial Science, University of Waterloo, 2010, pp. 2–10.

currently approximately 20% of contributions are invested. The premiums are paid equally by an employee and an employer, who pay 4.95% of the salary each. Self-employed persons pay 9.9% of their earnings. There is a lower limit of 3500 dollars and an upper limit of 54,900 dollars (in 2016) of the annual income below and above which no contributions are made.

An assumption of CPP/QPP is to allow it to keep the 25% replacement rate for the income of people who pay the highest contributions. The general retirement age for the second pillar is 65 years, though beneficiaries may speed up or delay this moment by 5 years. The pension of those who want to receive it earlier may be as much as 36% lower than the pension available to them at the age of 65, since it is decreased by 0.6% for each month. For those who delay their retirement, the payment grows by 0.7% for each month of delay (maximally by 42%)[11].

CPP/QPP may be joined by persons over 18 who had at least once contribution deducted from their salaries. The payment amount depends on the number and value of contributions. When calculating the amount of payment, periods of lower earnings and non-earning periods are omitted, but the maximum period to be omitted is 17% of the insurance period. The purpose is to increase the amount of due pension. Pensions are indexed annually with the CPI. The law stipulates that there are two supplements to CPP/QPP payments: for persons still working when receiving pension from CPP (Post-Retirement Benefit – PRB) and for persons who, due to taking care of children, obtained lower incomes or did not earn at all (Child Rearing Provision). The former supplement is allocated to CPP/QPP beneficiaries aged 60-70, who still work and make contributions to the second pillar (employees aged 60-65 obligatorily make contributions for CPP/QPP). PRB allows to increase the amount of payment maximally by 1/40 for each year of making contributions and receiving pension. Currently pensions are paid to 5.2 million people. In 2015 the average monthly payment from CPP/QPP was 640 dollars, while the maximum payment was 1065 dollars. The sum of all second pillar expenses was 37.7 billion dollars in 2014, of which 2.93% was the costs of the system, while the incomes were at the level of 43.2 billion dollars[12].

5. FORECASTS FOR THE PENSION SYSTEM IN CANADA

The forecasts concerning the 2nd pillar say that until 2022 the incomes will exceed the expenses, therefore the main goal for system managers is to ensure financing and gradually move away from the redistribution into the capital system. Canada Pension Plan Investment Board (CPPIB) was established in 1997. It is a state enterprise independent of the government, which deals with investing premiums and whose goal is to maximize the return on investment rate while minimizing the risk of incurring losses. The monetary means owned by CPPIB are invested in public and private capital market instruments, at home and abroad and in real estate. Over 63% of the funds are invested outside Canada, especially in the USA. Currently, the most frequently chosen forms are shares and bonds of stock exchange companies, government securities are becoming less popular. The funds collected within CPP/QPP are insured and are not treated as other revenues to the budget. The forecasts concerning the second pillar say that if the return on investment rate is maintained at the

[11] *Canada Pension Plan (CPP)*, 2016, http://www.cra-arc.gc.ca/tx/bsnss/tpcs/pyrll/clcltng/cpp-rpc/menu-eng.html (acccessed: 22.01.2016).

[12] Government of Canada, *Annual Report of the Canada Pension Plan 2013-2014,* 2014, pp. 1–4.

level of at least 4.4%, the system will receive sufficient funds to maintain the pension contribution at 9.9%. The average return rate in the past 10 years has been 5.6%, while in the past 5 years – 9.7%. The value of assets collected in the second pillar now amounts to 272.9 billion dollars[13].

One of the measures of pension system efficiency is the replacement rate, that is the sum of pension incomes obtained in the first year of receiving pension to the sum of incomes received in the last year of professional activity ratio. In Canada, the replacement rate among the poorest pensioners, who obtained minimum incomes before they retired, may sometimes exceed 100%, since the base payment and supplements from the 1st pillar are granted regardless of the incomes obtained from employment. Figure 1 shows the replacement rate calculated by OECD. The base pension system allows people with average incomes to maintain nearly 50% of their current consumption level and its significance will decrease along with the beneficiaries' income growth. The total replacement rate from the base and additional systems exceeds the OECD average. The research conducted by OECD shows that Canada has one of the lowest poverty ratios among the elderly – 4.4%, whereas the OECD average ratio is 13.3%[14].

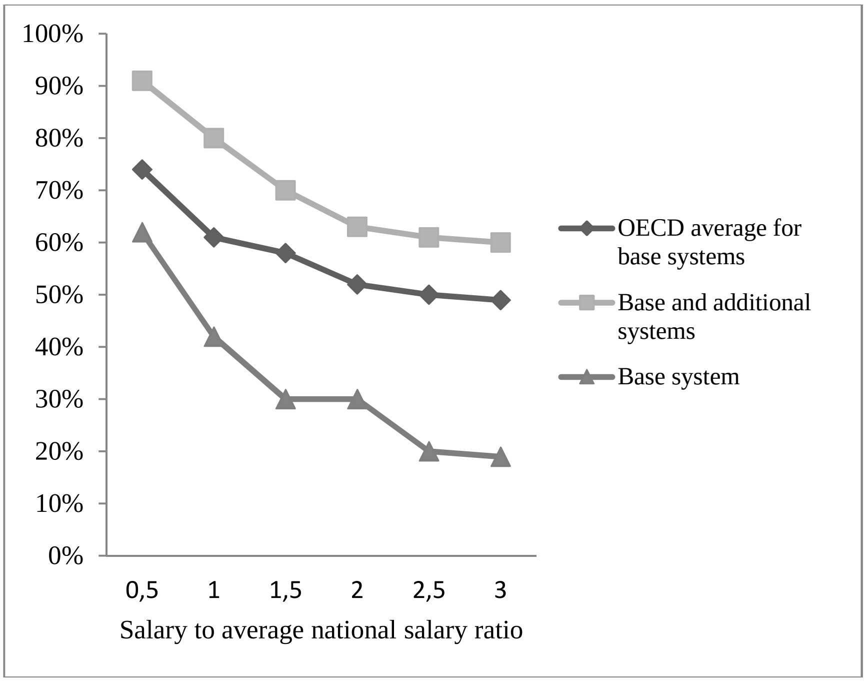

Fig. 1. The replacement rate in Canada compared to OECD average replacement rate
Source: own elaboration on the basis of OECD data.

[13] *Ibidem*, p. 9.
[14] OECD, *Pensions at Glance 2015: OECD and G20 indicators*, OECD Publishing, Paris 2015, pp. 225–228.

Recent years have also been marked with the development of the 3rd pillar, whose aim is to supplement the base benefits. The research commissioned by the government demonstrated that the value of savings collected in the 3rd pillar will allow 78% households reaching the level of 90% of their current consumption and 69% of household being able to keep the level of their consumption. The situation of Canadians is also improved by the fact that outside the third pillar they invest their savings in real estate and stock exchange. Participation in the third pillar is still very popular in Canada, though the percentage of employees participating in it has been falling recently. Non-obligatory nature of the system accounts for the fact that only some of the employees decide to secure their future source of income in this way. Approximately 30% of professionally active people choose individual saving plans. 21% of private employers invest financial resources in employee pension saving products for their staff. The situation of the capital part of the pension system is not aided by the capital market uncertainty, where return on investment rates may turn out to be too low. As a result of the 2008 crisis, the value of assets in the third pillar fell by 21.8%[15].

6. CONCLUSIONS

Canada is often quoted in public debate as a country with efficient pension system, providing payments at high level, though it is obviously not fault-free. The demographic forecasts clearly indicate that the current level of base pensions will be difficult to maintain. Canada is a developed country and it may ensure its citizens enjoy the current level of benefits because the society is consuming the incomes generated in previous years. The base system allows to secure only the basic living standard. The payments received by citizens depend on their individual decisions. Reality shows that Canadians have so far been aware of the necessity to make additional savings and what is more, they often possess sufficient assets enabling them to maintain their consumption level from the time of their professional activity. The declining popularity of 3rd pillar participation proves, however, that the society will be less inclined to save for their retirement period.

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KANADYJSKI PLAN EMERYTALNY W OBLICZU WSPÓŁCZESNYCH WYZWAŃ

W opracowaniu został przedstawiony obecnie funkcjonujący w Kanadzie bazowy system emerytalny. Omówiono I filar emerytalny, z którego świadczenia mają charakter emerytury obywatelskiej przyznawanej bez względu na przepracowane lata. Emerytura państwowa (OAS) przysługuje wszystkim obywatelom po osiągnięciu określonego wieku, którzy mieszkali na terenie Kanady po osiągnięciu pełnoletności przez co najmniej 10 lat, a dla pobierających to świadczenie za granicą okres ten wynosi 20 lat. Do świadczenia podstawowego przewidziane zostały dodatki dla osób najuboższych. Kolejno poddano analizie perspektywy I filaru oraz przestawiono główne zagrożenia, wśród których te o najdonioślejszym znaczeniu związane są z czynnikami demograficznymi, tj. z rosnącą długością życia oraz malejącą dzietnością. W dalszej części opracowania skupiono się na II filarze emerytalnym (CPP), który ma charakter redystrybucyjno-kapitałowy. Ten element systemu emerytalnego jest finansowany ze składek finansowanych przez pracodawców i pracowników. W zamierzeniu II filar miał być uzupełnieniem dla emerytury obywatelskiej, pozwalać na uzyskanie 25% stopy zastąpienia w odniesieniu do maksymalnych oskładkowanych dochodów. Obecnie generowane nadwyżki wpływów nad wydatkami w CPP pozwalają na inwestowanie wolnych środków na rynkach finansowych, w filar ten dopiero z czasem wbudowano kapitałowy komponent. W ostatniej części tekstu omówiono prognozy dla kanadyjskiego systemu emerytalnego uwzgledniające jego bazową i dodatkową część. Podkreślone zostało znaczenie indywidualnie podejmowanych działań mających na celu zapewnienie źródła dochodu po zaprzestaniu aktywności zawodowej.

Słowa kluczowe: bazowy system emerytalny, stopa zastąpienia, świadczenia emerytalne.

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