

**The City of Sopot
Development Strategy
for 2022 – 2030**

draft

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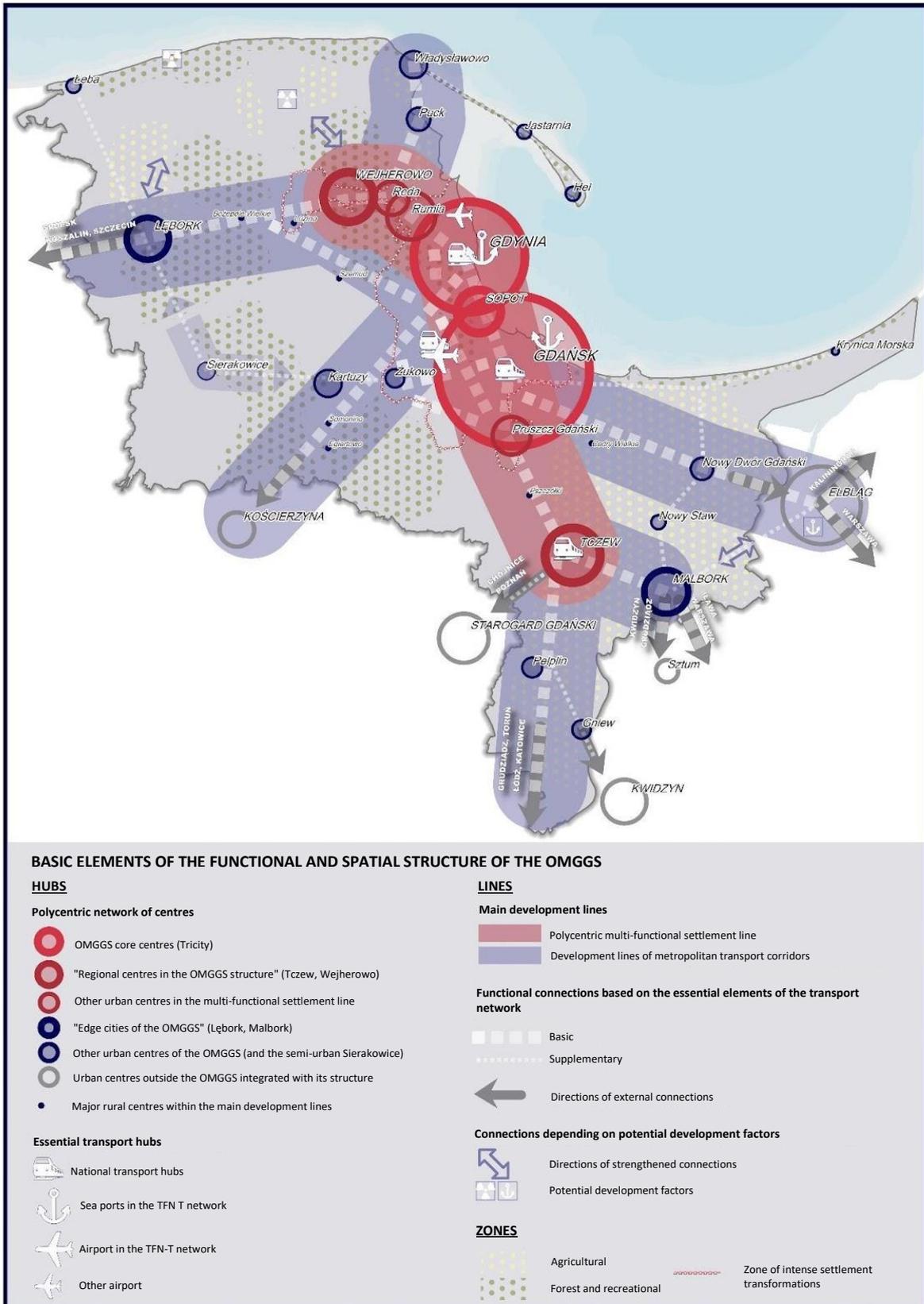
I. DIAGNOSIS SYNTHESIS

1. An important link in the metropolis

Sopot with Gdańsk and Gdynia are the core of the Gdańsk-Gdynia-Sopot Metropolitan Area (OMGGS). It is the crucial metropolitan area in northern Poland and the southern part of the Baltic Sea basin inhabited by more than 1.6 million people.

Sopot is an important hub of the OMGGS, mainly in terms of culture, science, supralocal sports, tourist and recreational infrastructure and business. Hence, the metropolitan context should be definitely taken into account when considering the strategic directions of Sopot development.

Fig. 1. Functional and spatial structure of the OMGGS.



Source: *Spatial development plan for the Gdańsk-Gdynia-Sopot Metropolitan Area*, December 2016.

2. Facing global challenges

2.1. Ageing population

- a) Sopot is a city strongly affected by the issue of ageing society. In Europe, this process has been going on and deepening, which is caused by a significant increase in life expectancy and the declining birth rate. Since the 1980s, the number of residents of Sopot has decreased by 18.0% – down to 35.3k people¹. This is accompanied by the growing number of the elderly in the population. It is a result of the continuing negative migration balance and a major drop in fertility rate. Negative birth rate in Sopot (almost – 8‰²) is one of the highest among towns in Poland.
- b) According to the demographic forecast³ and depending on the conditions, the estimated population of Sopot in 2030 may range from 29.9k to 34.6k inhabitants.
- c) Unfavourable demographic trends translate into high demographic dependency ratio. It means a growing deficit of working age people in Sopot, although it can be compensated by employees from other parts of the metropolitan area. If the current trends continue, the shrinking population of the city will be a growing challenge in the long run. On the one hand, the intergenerational imbalance requires constant development and improvement of access to certain services for the elderly (health and social integration, for example), and on the other, it might reduce access to certain services intended for the youngest generation (education, for example).
- d) Because of the demographic situation of Sopot, it is necessary to look for ways to prevent the further decline in the city's population, including by starting a system of incentives to stay or settle in the area. They should be addressed mainly to young people in the metropolitan area, the entire country and abroad, including students, entrepreneurs, athletes, cultural professionals and people with high professional qualifications and competences.

2.2. Climate changes

- a) When planning the future of Sopot in the long-term perspective, we should consider the intensification of extreme events (such as drought, heat waves, downpours, hurricane winds, intense storms and floods). Global warming has been contributing to increase in water levels in the seas and oceans⁴. The risks and harms of climate change are growing and are felt strongly in urban areas. Especially in coastal regions, even a small rise in sea level can lead to local flooding and considerable social and economic costs.
- b) The risk of threats in connection with climate change varies in Sopot. Similarly to other coastal cities, there is a risk of the beach being flooded by the sea, and with more frequent torrential rains, the city is also exposed to local inundation. The rainwater drainage system has been modernised for many years, but there is still an actual risk of flooding, due to the limitations of the surface water retention system (Lower Sopot). The effects of this threat will be a continuing burden for the city⁵.

¹ In 2020 (source: GUS BDL).

² Ibidem.

³ *Variant of demographic forecast for Sopot by 2050* prepared by prof. dr hab. Przemysław Śleszyński, Institute of Geography and Spatial Organisation at the Polish Academy of Sciences (PAN), 2021.

⁴ Forecasts for the rise of the Baltic Sea level in various models range from 20 cm to 200 cm in 2100. It is the effect of increasing water volume caused by melting of the glaciers and rising temperatures.

⁵ There are three aspects of the flood risk in Sopot: flooding (the effect of damming waters of the Gulf of Gdańsk and breaking the area of dunes), infiltration (the effect of a general rise in sea level) and precipitation (the result of torrential rains).

c) Annual average temperatures are rising in the city. In the Tri-City, Sopot is the warmest and the coolest city in winter and summer, respectively⁶. The cooling effects of the sea are felt here in the summer period.

2.3. Civilisation factors

- a) The natural capital of Sopot is under increasing pressure of over-exploitation of resources. One of the many threats are the side effects of agriculture and fishery development. New fishing methods are destroying the ecosystem of the Baltic Sea, reducing the fish population to alarming levels, while the growing use of artificial fertilizers increases water pollution and, consequently, eutrophication of the Baltic Sea, including the Gulf of Gdańsk.
- b) A different kind of threat is posed by lifestyle diseases. They are the main causes of mortality among the residents of Sopot. By 2019, the city did not stand out when it comes to the number of cancer deaths per 100k residents, but in 2020 the results got worse⁷. In Sopot, deaths caused by cardiovascular diseases⁸ occur almost twice as often as those due to cancer. In this case, 2020 was also an exceptionally unfavourable year⁹. It was probably affected by the COVID-19 pandemic and the related limitations in access to healthcare services¹⁰.
- c) The excessive burden on the healthcare system can be seen in consultations related to mental disorders, for example. Reducing the availability of diagnostics, medical advice and therapy, combined with the fear of physical visits to health care institutions during the pandemic, have contributed to the deteriorating health of residents.
- d) Despite a number of negative consequences, the pandemic has accelerated digitisation of businesses and society¹¹. The demand has grown for solutions in the area of remote work, e-medicine, e-learning, e-administration and e-commerce services. There are no restrictions on access to the Internet in Sopot, but it is reasonable to expand the range of e-services and to perform educational and information activities improving the digital competences of residents.

3. Health resort

⁶ Source: *Atmospheric air pollution in the Tri-City agglomeration in 2019 and information on the activities of the ARMAG Foundation*, Gdańsk, December 2020.

⁷ According to the Central Statistical Office (GUS), 366 people/100k residents died of cancer in Sopot, compared to 289 in Gdańsk and 295 in Gdynia.

⁸ This means approx. 30% more than in Gdańsk and Gdynia (source: GUS).

⁹ According to the Central Statistical Office (GUS), mortality caused by cardiovascular diseases in 2020 was the highest in many years: 644/100k residents in Sopot (556 in 2017), compared to 501 in Gdynia and 494 in Gdańsk.

¹⁰ The provision of medical, social and care services in remote mode could be a barrier to the relatively older community of Sopot. The fear of contagion and seeking medical help too late could also be of importance.

¹¹ As shown in the report published in 2021, Poland is still fourth to last in terms of digital competences <https://digital-strategy.ec.europa.eu/en/policies/desi>.

3.1. Unique environment

- a) The success of Sopot is based on natural conditions such as: seaside location, sandy beaches, varied topography¹², biodiversity¹³, clean air and relatively clean water. These determine its unique microclimate and combined with a brine spring¹⁴ they allowed Sopot to be classified as a health resort. Because of its small population, more than half of area being covered by forests¹⁵ and the lack of industry, the city does not generate major threats to its environment and microclimate.
- b) The residents of Sopot consider the following the most important threats to the environment: excessive car traffic¹⁶, air quality in the heating season (solid fuel stoves) and excessive tourist traffic (noise and pollution)¹⁷.
- c) The air in Sopot meets the standards¹⁸ and the pollution is felt along the main transport routes (vehicle traffic). The dustiness also increases seasonally as a result of heating with solid fuel boilers. However, their number is rapidly decreasing. Air quality is a major challenge for maintaining the attractiveness of living and the further growth of the city as a resort.
- d) Another big challenge is the growing anthropopressure on the natural environment (primarily due to tourist traffic), which in the long run threatens the city's natural capital.
- e) Increasing amount of funds has been allocated to the city budget for air, climate and water protection¹⁹. European integration is a factor favourable to the environment. To care for its unique natural capital, Sopot has repeatedly and successfully applied for EU funds for this purpose, recently primarily for the systems designed for monitoring air and groundwater quality and flood risk²⁰.

¹² Sopot is located between the shores of the Gulf of Gdańsk and the moraine hills of the Gdańsk Upland.

¹³ Protected areas are particularly noteworthy here, for example: the *Zajęcze Wzgórze* nature reserve, the TPK landscape park, ecological sites (*Swelinia Ravine, Grodowe Canyons, Corydalis Hill, Yew Hill, Lily of the Valley Hill*), 37 nature monuments and Natura 2000 sites (*Puck Bay and Orłowo Cliffs and Stone Reefs*).

¹⁴ The southern section of the coastal belt includes medicinal underground waters with a medicinal water well (the Intake of St. Adalbert).

¹⁵ The buildings reach the foot of a wide, forested slope of moraine hills on a narrow space of two coastal terraces separated by the so-called Sopot Cliff.

¹⁶ The transit nature of the transport system in Sopot in relation to Gdańsk and Gdynia is a source of negative aerosanitary and acoustic impacts. Noise levels are exceeded along the main transport routes.

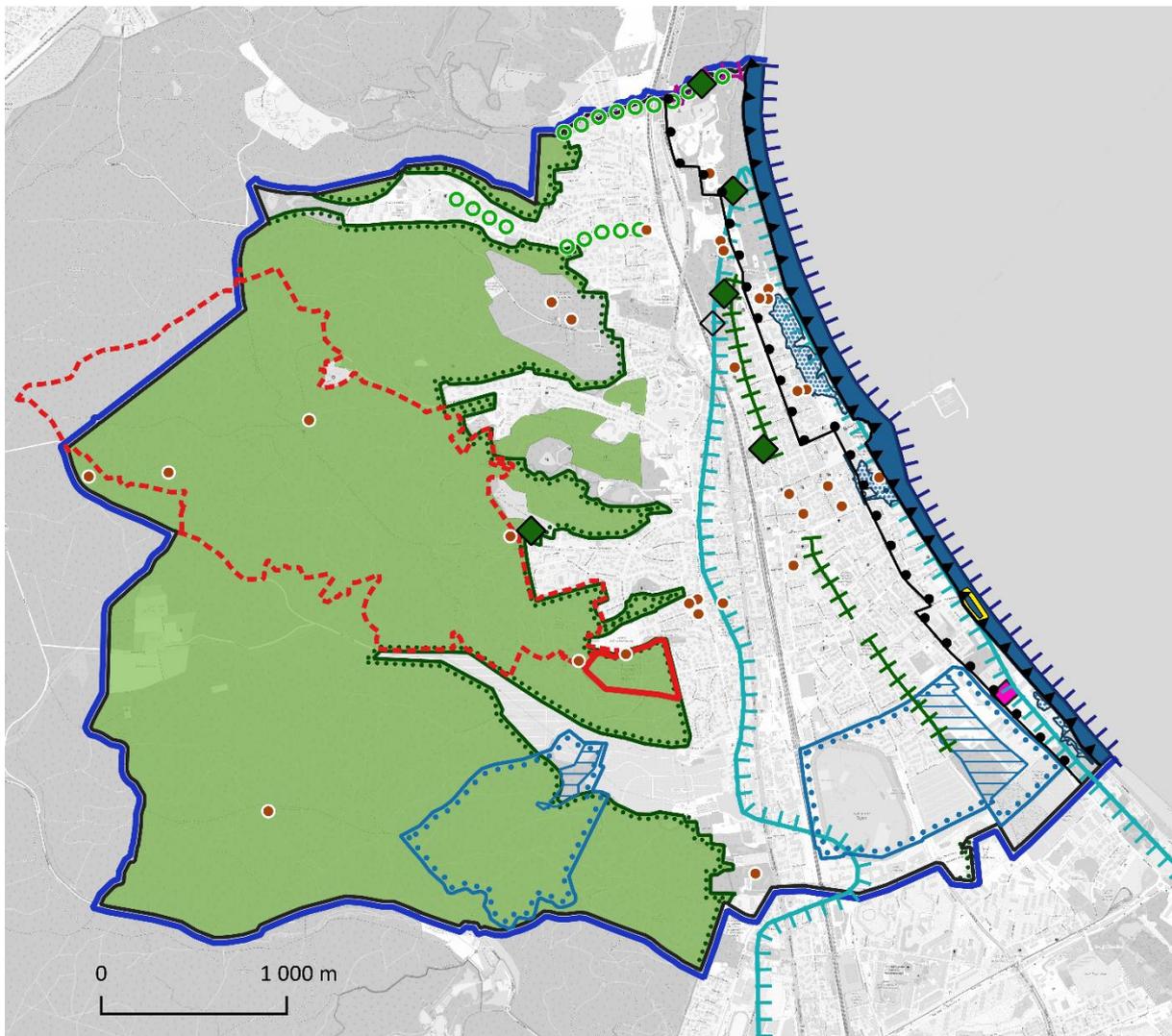
¹⁷ See: the survey conducted in July 2020 by PBS Sp. z o.o. on random representative sample of the residents of Sopot and the metropolitan area, using telephone interviews (hereinafter "*PBS Survey* ").

¹⁸ According to the data of ARMAG Foundation.

¹⁹ Ten times more funds were spent in 2020 on air and climate protection compared to 2010 (source: GUS BDL).

²⁰ This involves projects under the Pomorskie Regional Operational Programme (RPO WP) 2014-2020: a) *Expansion of atmosphere monitoring in the Tri-City agglomeration* carried out jointly with Gdańsk and Gdynia as part of the ARMAG Foundation, and b) *Expansion of systems for informing and warning about threats, in particular floods, for Gdańsk and Sopot*.

Fig. 2. Condition and protection of natural environment resources.



NATURE CONSERVATION - ESTABLISHED AND PLANNED FORMS OF PROTECTION

- borders of the "Zajęcze Wzgórze" nature reserve
- - - border of the postulated "Sopot Forests" nature reserve
- borders of the Tri-City Landscape Park
- borders of the Natura 2000 site - Klify i Rafy Kamienne Orłowa
- borders of the Natura 2000 site - "Zatoka Pucka" Special Bird Protection Area
- ◆ ecological sites
- ◇ naturally valuable areas designated for protection as ecological sites
- nature monuments
- ecological corridors of local importance
- + Sopot Cliff
- OTHERS**
- forests

CONSERVATION OF WATER RESOURCES

- borders of main groundwater reservoir GZWP 112
- the entire city area within the main groundwater reservoir GZWP 111
- medicinal water deposit - "SOPOT" mining area
- ⋯ borders of indirect water intake protection
- ▭ border and area of direct water intake protection

PROTECTION OF COASTAL STRIP

- ▲ service strip border
- buffer zone border
- fishing harbour border

AREAS OF PARTICULAR FLOOD RISK

- ▨ area with low risk of flood - once every 500 years
- area with medium risk of flood - once every 100 years

Source: own study based on the *Study of the conditions and directions of spatial development of the city of Sopot*, 2018 and *Design documentation for the "Sopot Forests" Nature Reserve*, Naturalists' Club, 2021.

- f) An ecological problem that goes beyond the borders of Sopot is the situation in the Tri-City Landscape Park (TPK). The current forest management in the TPK results in excessive felling of old trees²¹, which has a negative environmental, hydrological and social impact and is met with opposition from the residents²². It has been postulated to apply reserve protection to a part of the TPK forests²³.
- g) Another supra-local and major problem is the water quality in the Gulf of Gdańsk, i.e. its progressing eutrophication caused by agricultural activity and the rising temperature with limited circulation²⁴. The problem of wrecks and chemical munitions on the bottom of the Baltic Sea also requires an effective solution, as it may lead to a massive leakage of toxic substances into water.

3.2. Sopot health resort

- a) Since 1999, Sopot has been one of 45 Polish health resorts. The natural medicinal resources used here include: medicinal water, brine, peat and climatic factors²⁵. Based on the Charter of Sopot Health Resort²⁶, the city has been divided into protection zones A, B and C, with restrictions on land management and development as well as various types of activities²⁷.
- b) There are public spa facilities in the resort area²⁸. There is also a number of private institutions that provide access to specialist health treatments. Furthermore, the Pomeranian Rheumatology Centre located in the city offers orthopedic and traumatic, rheumatological and cardiological treatment, and in addition the treatment of diseases of the respiratory tract and the nervous system, diabetes, and osteoporosis. The North and South Park with the Spa Square are part of recreational facilities for both patients and tourists. The health services are supported by spa treatment facilities: inhalation mushroom and mineral water pump room.
- c) The number of health resort beds during maximum occupancy is sufficient for approx. 1,600 patients per month. However, many of them use other forms of accommodation and regeneration. The large share and impact of the health resort status on the economy is supported by the data on companies registered in Sopot in the relevant sectors of the economy, related to "spa activities", the beauty sector and therapeutics.²⁹

²¹ Sopot forests (except for nature reserves and municipal forests) are forests managed by the Gdańsk Forest District. This is why their actual situation depends on the policy pursued by the State Forests National Forest Holding.

²² In the *PBS Survey*, respondents indicated tree felling as the sixth most important threat to the environment in Sopot.

²³ *Design documentation for the "Sopot Forests" Nature Reserve*, Naturalists' Club, Świebodzin, 2021.

²⁴ Although the waters of the Gulf of Gdańsk are subject to periodic blooms, the water on the beach in Sopot is generally suitable for swimming, and no harmful bacteria have been found on the local beaches.

²⁵ Study report *Diagnosis of health resort gminas in Poland*, dr hab. Justyna Wiktorowicz, Department of Economic and Social Statistics at the University of Łódź, 2020, <https://www.nist.gov.pl/>.

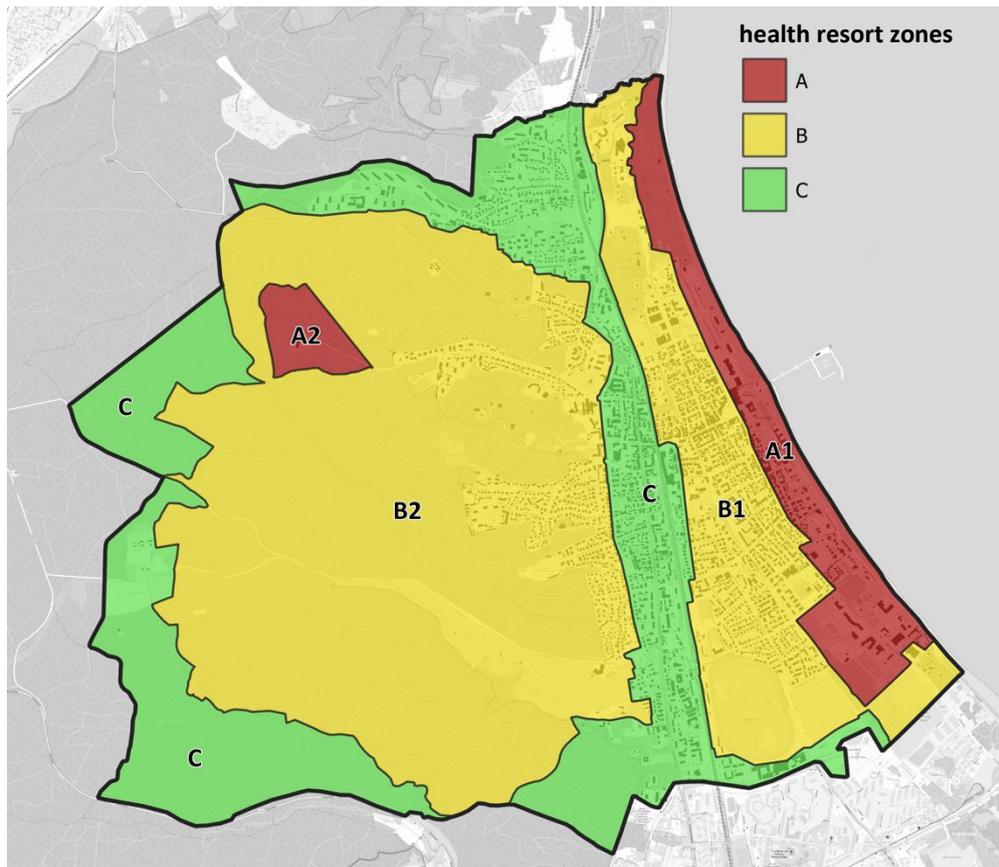
²⁶ The current charter was established by Resolution No. XXIII/383/2021 of the Sopot City Council of 19 March 2021.

²⁷ Zone A (divided into A1 and A2) includes areas where it is possible to provide spa treatment under suitable conditions as well as all spa treatment facilities and equipment (in this zone it is prohibited to build single-family and multi-family residential buildings, for example). Zone B (divided into B1 and B2) is a protection for zone A and is designated for housing, services for residents and for the construction of the necessary technical and supply base and the location of sports and tourist facilities, etc. Zone C covers the area adjacent to zone B, which is its surroundings and has an impact on the preservation of landscape and climate values and the protection of deposits of natural medicinal resources.

²⁸ These include Health Resort of the Ministry of Interior and Administration and the "Leśnik" Spa

²⁹ Sections Q, S and T of the PKD classification, which is almost 12% of companies in Sopot.

Fig. 3. Protection zones in the health resort area.



Source: own study based on the *Charter of the Sopot Health Resort*, March 2021.

3.3. Cultural heritage as an important development potential

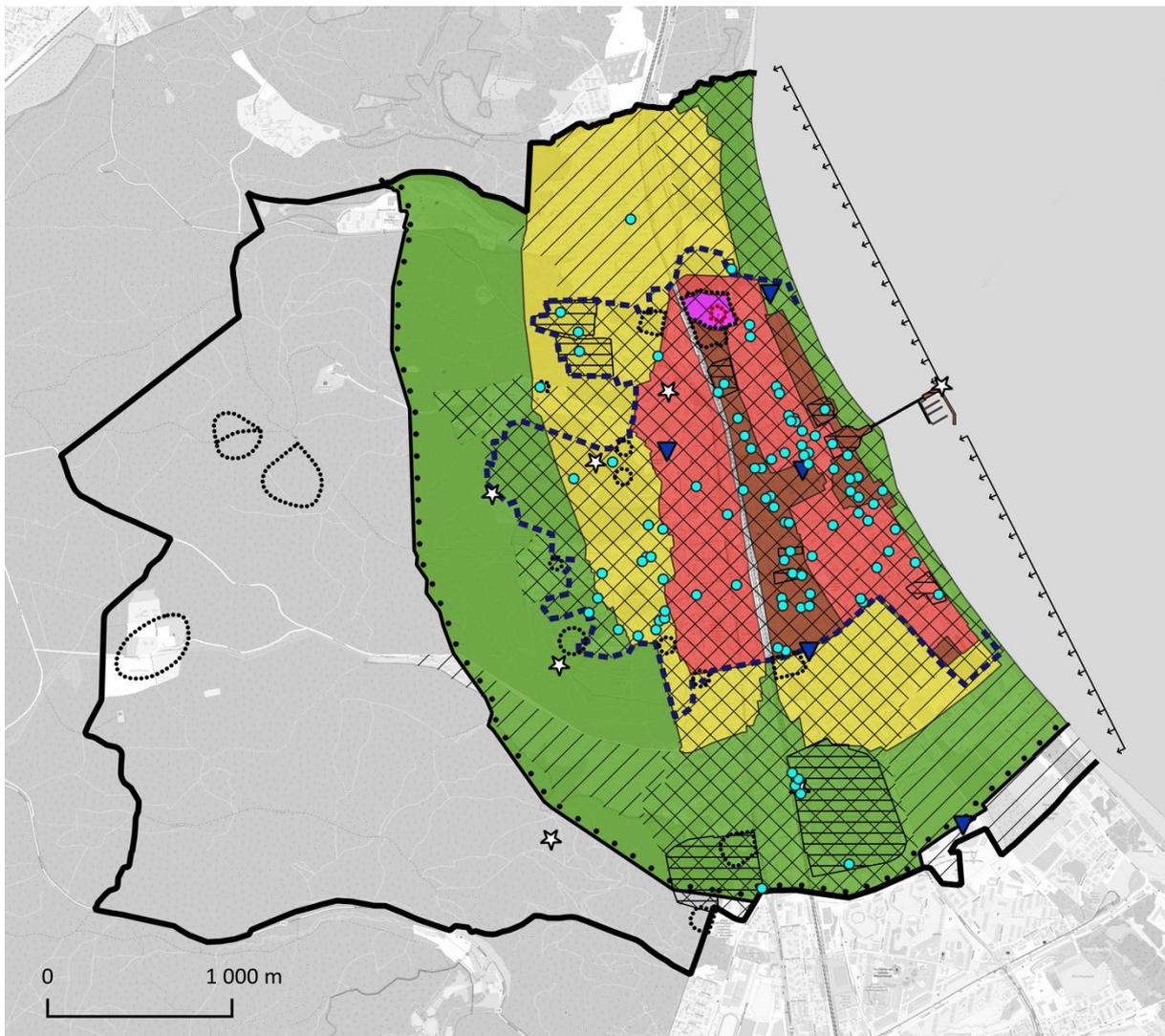
- a) The current buildings in Sopot are mostly the result of transformation of the suburban bathing settlement into a fashionable health resort at the turn of the 19th century. Sopot is a city that has preserved the unique charm of a historic health resort with specific summer houses, villas and tenement houses surrounded by rich vegetation.
- b) Within the city there are 88 historical monuments, entered into the register of monuments of the Pomeranian Voivodeship³⁰. One of them is the urban and landscape layout of the city with designated conservation zones. In addition, about 1,500 sites are recorded in the Municipal Register of Monuments³¹. There are also archaeological sites within the city (including an early medieval stronghold) with established conservation zones.
- c) Sopot also features 5 sites of outstanding architectural value, which are protected as contemporary cultural assets.³²

³⁰ As at February 2022: <https://www.ochronazabytkow.gda.pl/rejestr-zabytkow/rejestr-zabytkow-nieruchomych/>

³¹ <https://bip.sopot.pl/Article/get/id,16357.html>

³² These include the Ergo Arena sports and entertainment arena and the "Krzywy Domek".

Fig. 4. Condition and protection of cultural heritage and contemporary cultural assets.



PROTECTION OF CULTURAL HERITAGE - ESTABLISHED AND PLANNED FORMS OF PROTECTION

border of the Sopot urban and landscape complex with the conservation zones entered in the register of monuments

CONSERVATION ZONES "A" IN THE PROTECTED AREA

- A1 - cultural landscape reserve
- A2 - urban conservation zone
- A3 - urban restoration zone

CONSERVATION ZONES "B" IN THE ENVIRONMENT PROTECTION ZONE

- B1 - size limitation zone
- B2 - landscape protection zone

- sites entered into the Register of Monuments of the Pomeranian Voivodeship
- archaeological sites
- archaeological sites entered into the Register of Monuments of the Pomeranian Voivodeship
- contemporary cultural assets
- viewpoints
- sites entered into the Register of Monuments of the Pomeranian Voivodeship
- exposition of the city view from the sea

VALORIZATION OF THE HISTORICAL SPATIAL STRUCTURE

- area of preserved historical spatial structure
- area of preserved historic elements
- area of exposure of historical sites

Source: own study based on the *Study of the conditions and directions of spatial development of the city of Sopot*, March 2018.

3.4. Prestigious tourist destination

- a) Tourism and other leisure services form an important branch of the economy of Sopot in connection with the health resort function. They are an important source of income for many residents. Sopot attracts tourists and patients all year round, but the peak of the tourist season is mainly during the summer months. During the year, the city is also very popular among tourists on weekends and holidays, including the so-called short holidays (such as Christmas and New Year period). The number of visitors to Sopot at that time is one of the highest among Polish tourist locations. However, the actual number of tourists in Sopot is difficult to estimate. This is due to the fact that the city is also eagerly visited by people accommodated in Gdańsk, Gdynia and even outside the Tri-City³³.
- b) Sopot experiences the negative impact of the pandemic on tourism. In 2021, the pier in Sopot was visited by over 200k people less than in previous years³⁴ and 90% of tourists came from Poland. Because of restricted air transport, foreign tourists were represented mainly by people from Germany, the Czech Republic and Lithuania. Therefore, the proportion of foreign and Polish visitors changed considerably - before the pandemic it was approx. 60% of domestic tourists and 40% of foreign tourists (mainly from Scandinavia)³⁵. This surely had an impact on the decrease in the revenues of Sopot recorded in 2020³⁶.
- c) Sopot offers many varied accommodation options. High-class hotels, guesthouses and hostels complement the city-wide accommodation offered for short-term rental by property owners³⁷. Mass buy-out of flats in Sopot for short-term rental has become an investment method, also for investors from outside the city. This means that a considerable part of revenues from this activity does not generate benefits for the city or generates only a small benefit³⁸. The occupancy rate (before the pandemic) shows a growing (despite high prices) demand for this type of accommodation. For many tourists, staying in Sopot during their holiday is a sign of prestige.
- d) The growing attractiveness of the city has led to an excessive concentration of tourist traffic in its central and coastal sections, reducing the quality of life of the residents in these areas and posing a threat of degradation of natural resources. Lower Sopot is no longer a place of residence for people of various social status. It is becoming dominated by relatively wealthy people, who occupy an increasing number of real estates or buy them for new purposes (such as hotel industry, gastronomy or other services). This involves an increase in the prices of services, flats and other real estate.

³³ According to research, Sopot (the entire Tri-City) is characterised by a high percentage of tourists throughout the year. For more information see: *Analysis of the activity and population potential of the Pomeranian Voivodeship, the metropolitan area and the Tri-City based on the behaviour of mobile network users in 2019*, Joint publication, Gdańsk-Gdynia 2021.

<https://pbpr.pomorskie.pl/books/analiza-aktywnosci-i-potencjalu-ludnosciowego-województwa-pomorskiego-obszaru-metropolitalnego-i-trojmiasta-w-oparciu-o-zachowania-uzytownikow-sieci-telefonii-komorkowych-w-2019-roku/>

³⁴ In the pre-pandemic summer season of 2019, almost 1.2 million tickets to the pier in Sopot were sold (source: PTH Kąpielisko Morskie Sopot).

³⁵ Information from the Municipal Sports and Recreation Centre https://esopot.pl/pl/11_wiadomosci/10112_sopot-ponad-800-tys-wizyt-na-molo-i-90-proc-turystow-z-polski-tak-wygladal-sezon-w-kurorcie.html.

³⁶ The decrease in revenues compared to 2019 was 10%, with the share in state budget taxes dropping by 6% and 7.4% for PIT and CIT respectively (source: GUS BDL).

³⁷ According to the data of the Sopot City Hall, residents of this city own approx. 56% of real estate (flats and single-family buildings).

³⁸ Until 2018, real estate taxes in Sopot were growing on a yearly basis, then remaining the same from 2018, while in 2020 they fell by 1% (source: GUS BDL).

3.5. Fashionable centre of culture

- a) Sopot offers culture on many levels. On the national scale, the city has a particularly good climate for the development of culture addressed to local and regional as well as foreign people. It offers music, film, radio, theatre and poetry festivals, and book fairs. An additional contributing factor is the original infrastructure (e.g. Forest Opera, Atelier Theatre and numerous galleries). The congress profile of Sopot is also important, as it increases the city's prestige.
- b) The factor that completes the cultural image and participation in culture is the popularity of mass events organised in the city, including concerts and sports events (e.g. in the ERGO Arena or at the Sopot Hippodrome). Every year, approx. 400k people participate in such events in Sopot. The city is also visited by participants of mass events organised in Gdańsk and Gdynia, which means a periodic rise in the number of tourists, and sometimes the accompanying increase in undesirable behaviour (noise).
- c) Although the cultural offer is quite varied, further actions are being taken to build the image of Sopot as a place that meets the needs of residents, tourists and artists. These activities will enable active, grassroots and creative inclusion of the local community in the city's cultural life. A new cultural institution *Goyki 3 Art Incubator* was established for this purpose in 2021 with the aim to create and promote culture, provide cultural education and support creative communities (including independent ones).
- d) The residents of Sopot are very active when it comes to culture. Cultural capital is at a very high level, which is a powerful resource of the city (residents are conscious citizens, valuable employees and friendly neighbours), but at the same time poses a challenge for local authorities (higher expectations towards the government and local government than people with lower capital).

4. Advantages, potential and deficits

4.1. Residents: unique capital

- a) The key resource of Sopot are its residents, who are moderately wealthier, better educated³⁹, more cultured⁴⁰ and satisfied with life than average Poles. The range of social benefits in Sopot is gradually decreasing, which proves the lower number of people who need this form of aid. The reasons for this can be seen in the improving financial situation of residents, and at the same time in their decreasing number and higher average age (growing population with acquired pension rights).

³⁹ In 2011, almost 37% of the residents of Sopot had higher education (National Census, 2011), compared to more than 66% in 2020 (information from *the PBS Survey*). Even if these figures are somewhat overestimated (the 2021 National Census data are not available yet), they still clearly show a huge progress in the field of higher education in the last decade. This is happening not only in Sopot (a nationwide trend), but the change in that city is exceptional. This has far-reaching consequences, not only for the wealth of the residents or their labour market opportunities, but also for their lifestyles, political preferences and tastes in culture and art.

⁴⁰ Compared to other residents of the metropolitan area, the residents of Sopot more often read books and press, go to the theatre, concerts and art galleries. The information comes from *the PBS Survey*.

- b) For several years, Sopot has remained one of the most attractive locations in Poland, and its real estate prices are among the highest in the country. Furthermore, the city attracts wealthy people, some of which settle here permanently, but more often buy real estate or make investments in business activity. To some extent, the "new" Sopot residents contribute to the growth of the city by investing and spending their money here.
- c) The residents of Sopot take care of their health. They have good conditions for this thanks to a well-developed recreational and tourist infrastructure that encourages physical activity. Numerous bicycle paths (e.g. the Sopot Loop called "Tour de Sopot" is over 18 km long), tourist routes, beaches, outdoor gyms, etc. are intended for everyone. Fans of other sports can also use the sailing facilities (ERGO Hestia Sopot Sailing Club), tennis courts, swimming pools or the Hippodrome. The city authorities promote a healthy lifestyle through many programmes. Even so, the level of physical activity among Sopot residents is generally lower than in other parts of the metropolitan area, which can probably be explained by the high average age⁴¹.
- d) The life expectancy of the residents of Sopot is becoming longer, and over 70% of them are satisfied with their health⁴². However, the (already mentioned) deterioration of the mortality rates in 2020 is worrying, and the mortality caused by COVID-19 was also higher than in Gdańsk and Gdynia⁴³.
- e) The data of the Regional Examinations Board show that Sopot stands out positively compared to the Tri-City when it comes to the quality of education. In 2015-2019⁴⁴ the differences in the average results of middle school and secondary school exit exams were approx. 5 pp. As regards the eighth-grader exam of 2020, Sopot was ranked third among the poviats (behind Warsaw and Kraków) in terms of the average scores of Polish, English and maths exams, while the eighth-graders from Sopot achieved the best maths results in Poland. Yet, the survey data show that the city's education generally gets good results, they are lower than in other public services⁴⁵.

4.2. Space: a limited good of the highest importance

- a) Sopot is a city of special spatial value resulting from the adjacent sea, a forest-covered slope of moraine hills and the borders with Gdańsk and Gdynia. The city has a compact building structure, high-quality urban layout and architecture, and public spaces – some of them are among the most attractive and most recognisable in Poland. The reserves of land are small, and new projects can generally be carried out in already urbanised areas – by using gaps in the existing development or by redeveloping land, buildings and structures that have lost their utility or have been degraded.
- b) Given the limited supply of available buildings and land as well as growing real estate prices, the current diversity of functions in the city is at risk of being replaced by projects aimed at maximising profit and creating spaces with only one function, which "live" only during limited times of the day, week or year, becoming deserted in other periods. This may lead to the disappearance of those features that make the city attractive for residents and visitors, and for the development of

⁴¹ The residents of Sopot are more often active than the residents of the metropolis only in the case of Nordic walking, swimming and horse riding. The data comes from *the PBS Survey*.

⁴² Source: *PBS Survey*.

⁴³ In 2020, 9.9 out of 10,000 residents of Sopot died due to the COVID-19 pandemic, compared to 9.4 in Gdańsk and 8.6 in Gdynia (source: GUS BDL).

⁴⁴ The last middle school exam was conducted in 2019.

⁴⁵ Source: *PBS Survey*.

economic activity. Paradoxically, the investment potential of Sopot may bring a gradual reduction of its diversity.

4.3. Economy: service-driven and still thriving

- a) Sopot is economically strong. The city has a growing revenue from taxes as well as alternative national and European sources. The EU funds obtained in the last years have allowed for a number of new projects supporting the growth and modernisation of the city as well as improving access to public services (e.g. the construction of the Geriatric Care Centre). In addition, almost 200 projects were implemented in the city from the civic budget⁴⁶.
- b) The strong economic standing of Sopot is confirmed by the rankings of the richest cities/poviats in Poland and statistics on local government revenue per capita, for example, which give the city a leading position. Among Polish cities with powiat status, Sopot is ranked first in terms of city's own revenue per capita.⁴⁷
- c) The economic structure of Sopot has remained stable over the last several years. The city owes its economic successes mainly to services, primarily the broadly defined leisure activities, including tourism. As a health resort, a supra-regional leisure and recreation centre and an important cultural, sports and congress centre, Sopot uses these advantages to strengthen its own profiled economy. The following are growing dynamically in the city: wholesale and retail trade, accommodation and catering services as well as entertainment and beauty services. In recent decades, Sopot has become a location for enterprises in the modern services sector. Highly specialized services (i.e. advisory, educational, consulting, legal, IT and other services) are also developing here and the same goes for professional, scientific, technical and construction activity.
- d) Over 96% of Sopot business are enterprises employing up to 10 people⁴⁸. Large companies have their offices in Sopot primarily for prestigious and transport reasons, and also due to the good availability of educated staff on the Tri-City labour market.
- e) The data from the Central Statistical Office (GUS) show that the unemployment rate recorded for several years in Sopot is much lower than the average for the Pomeranian Voivodeship and the entire Poland. The reason for this is the relatively high supply for labour in the city itself and the education of its residents, which makes it easier to find a job, but also the good situation on the labour market in the entire Tri-City. In this context, it is also important to note that the increasing share of Sopot population is in the post-working age, supported mainly by social benefits, especially pensions, rather than jobs.

4.4. Public services: well-accessible on a metropolitan and local scale

- a) Sopot benefits from its central location and good connections in the metropolitan area. Thanks to this, it is also well connected on the international level. Recent projects in the Tri-City (such as the tunnel under the port channel in Gdańsk) have improved transport within the metropolis, including access to Sopot. In addition, the city benefits from a well-developed public transport system that

⁴⁶ Sopot was the first city in Poland to introduce a civic budget.

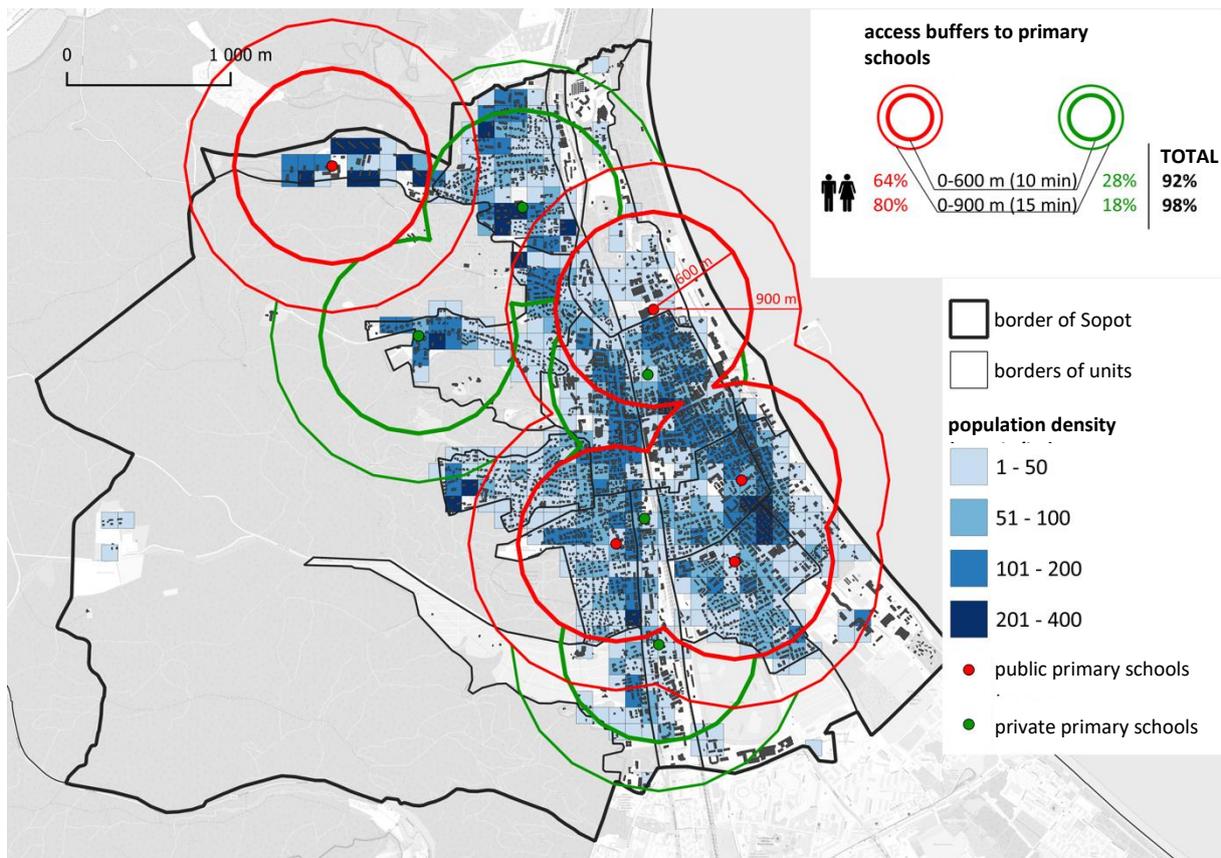
⁴⁷ Source: GUS BDL.

⁴⁸ Source: GUS.

works effectively the metropolitan area. In this context, particular attention should be paid to the somewhat unused potential of the agglomeration railway in passenger transport⁴⁹.

- b) The well-developed urban layout of Sopot perfectly realises the idea of a "15-minute city", in which pedestrian access to basic public and commercial services and a significant number of jobs is within 15 minutes from the place of residence. Basic service facilities (schools, kindergartens, health centres, shops, public transport hubs, etc.) are arranged adequately to the emerging demand (details shown in Fig. 5 and Fig. 6).

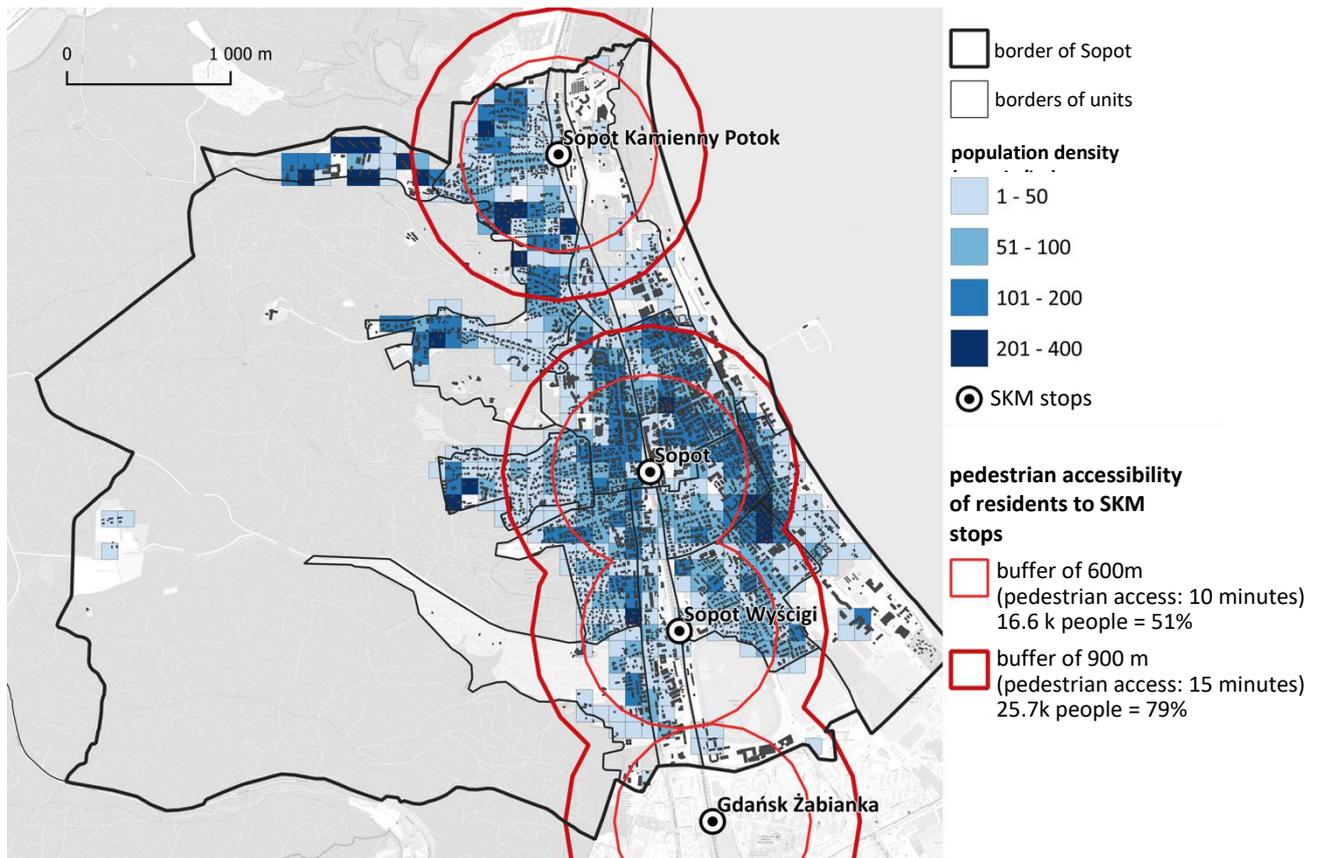
Fig. 5. Spatial accessibility to primary schools in Sopot.



Source: own study.

Fig. 6. Spatial accessibility to agglomeration railway in Sopot.

⁴⁹ It is important as almost 80% of the residents of Sopot live within a 15-minute walk to the SKM stops.



Source: own study.

c) In addition to public transport, the residents of Sopot use other public services available in the entire metropolitan area (including medical, educational, entertainment and cultural services). At the same time, Sopot is an “excessive” (in relation to its size) provider of “leisure services”, including culture and entertainment, for the entire metropolitan area and for people from other parts of the country.

4.5. Flats: scarce and expensive

- a) One of the key problems of Sopot is the deficit of flats, mainly social housing⁵⁰. This deficit is very difficult to overcome because of little terrain available (see point 4.2) and the protection regime in connection with the valuable urban and landscape layout (see point 3.3.).
- b) The secondary housing market is supply-constrained, and very high average prices and low diversification limit the demand. Interest in buying flats is expressed mainly by people (investors) who plan short-term rental, which considerably limits the purchase options for young people who want to stay or settle in Sopot.

⁵⁰ This deficit is caused, among others, by the city's policy in the 1990s, when many flats were sold to tenants in accordance with the nationwide trend resulting mainly from central regulations. Interestingly, the GUS data from 2020 show that the scale of social housing in Sopot was relatively higher than in Gdańsk and Gdynia. While there were 18k such flats in Gdańsk (26 people/flat), and 5.5k in Gdynia (44 people), in Sopot this number was 1,660 (21 people). In addition, according to the data of the Sopot City Hall, there are currently 1727 government flats in the city, with 49 under construction and plans for another 240.

- c) Gdańsk and – to a lesser extent – Gdynia maintain their settlement attractiveness for residents, while Sopot registers their regular outflow (continuing negative migration balance). Young people, not only young residents of Sopot, do not decide to settle down in this city, as other locations in the metropolitan area provide wider and cheaper housing options, at the same time giving the opportunity to enjoy all the benefits of living in the metropolis (labour market, leisure activities, etc.). The lack of geographical distance makes it easy to move from Sopot to Gdańsk or Gdynia, and social ties can be maintained without problems.

4.6. Municipal infrastructure: developed but imperfect

- a) In the last dozen or so years, the municipal infrastructure in Sopot has been built, developed and modernised, and as a result one hundred percent of Sopot residents have access to the water supply and sewage systems, with 82% having access to the gas network⁵¹. While the population is declining, the high (and rising) costs of maintaining the infrastructure systems pose a big challenge for the city.
- b) The sanitary sewage network in Sopot has a separate system for rainwater and sanitary sewage. The projects carried out in this area have significantly improved the system protecting against flooding of Lower Sopot. However, torrential rains still pose a risk of flooding, mainly due to limited surface retention.
- c) Waste management remains a challenge for Sopot. Although their global weight has been decreasing since 2018, the share of selective collection – almost 46%⁵² – was lower than in Gdańsk and Gdynia⁵³ in 2020. On the other hand, the city has already reached 70% recycling and preparation for re-use of selectively collected municipal waste, which exceeds Poland's commitment by 2035 in this regard.⁵⁴

4.7. Safety: affected by the tourist season

The open community of Sopot faces the undesirable effects of its own activity and hospitality. Because of an increased tourist traffic and the number of people who arrive to the city for a brief stay, for years crime rates have been higher than in Gdańsk and Gdynia⁵⁵. However, a downward trend was observed until 2018, and the rate of identified crimes fell by half compared to 2013. Recently, the situation has stabilised with a slight upward trend. It can be generally concluded that safety in Sopot has improved, as confirmed by the opinion of the residents, who consider Sopot to be a safe place that is good to live in⁵⁶.

⁵¹ Source: GUS BDL.

⁵² Source: Sopot City Hall

⁵³ Respectively: over 52% in Gdańsk and 53% in Gdynia.

⁵⁴ See: Directive (EU) 2018/850 of the European Parliament and of the Council of 30 May 2018 amending Directive 1999/31 / EC on the landfill of waste

⁵⁵ This fact should not be interpreted directly against Sopot. The indicator is converted per 1,000 residents, so it does not demonstrate the actual scale of the problem, as during the recorded incidents, the number of people in the city is much higher than its actual population.

⁵⁶ Opinions come from *the PBS Survey* and the conducted workshops.

4.8. Citizens: aware and committed

- a) Sopot is a city of high social capital. Its main great resource is the sense of community among the residents, which can be noticed on very different levels. The activity of local government institutions and NGOs indicate a good awareness of local distinctiveness.
- b) The residents of Sopot have been actively building a civil society. Citizens' involvement in the activities of the local government and their willingness and ability to organise themselves demonstrate that the residents of Sopot want to shape the reality that surrounds them⁵⁷. In this way, they strengthen ties that go beyond basic family and neighbourhood ties. Organisations dealing with ecology and nature protection are very active here, and the growing environmental awareness of residents leads to multiple pro-environmental activities.
- c) The quality of Sopot's social capital is confirmed by the participation in elections, among others. Data from the National Electoral Commission show that voter turnout in the city has always been high. The citizens of Sopot are willing to vote, for a long time achieving electoral participation above 70% of eligible voters⁵⁸.
- d) Almost 2,000 is the impressive number of students at the University of the Third Age in Sopot. This proves that Sopot seniors want activity and continuous learning, and shows their need for social contacts and care for their physical fitness.
- e) The quality of social capital is also confirmed by the civic attitude of residents during the prevailing pandemic. The residents of Sopot have approached vaccination against COVID-19 in a responsible manner.⁵⁹

4.9. Brand: recognisable and positive

- a) A huge resource of Sopot is its recognition and brand⁶⁰. It is difficult to appraise this resource, which is not easily quantifiable, but has a great importance. The good brand of the city has many sources. Sopot is considered a prestigious place for historical reasons, and its natural values were appreciated and started to be used a long time ago. Thanks to this, the city has a well-developed infrastructure for using its natural capital. Sopot has consciously built its brand and prestige. This is proven by the attitude to the types of economic activity described above, and above all, attaching great importance to broadly defined culture. It seems that Sopot's unique position on the map of Poland is built by its cultural activity and offer.
- b) Because of its nature, the city is attractive to the elderly, well-educated, wealthy people with high aspirations and cultural needs, as well as those with high and specific needs regarding lifestyle, who pay attention to self-governance, ecology and quality of services. It is also an attractive location for

⁵⁷ The number of registered social organizations per 10 thousand of residents in Sopot is approx. 100, which is twice higher than the average for Poland and close to the average for Gdańsk and Gdynia.

⁵⁸ Almost 78% of eligible voters participated in the presidential election of 2020, which is one of the highest results in the country.

⁵⁹ In mid-2021, Sopot was ranked 2nd in Poland and 1st in the region when it comes to the percentage of vaccinated residents. <https://pomorskie.eu/sopot-i-gdansk-wsrod-liderow-szczepien-w-polsce-w-pelni-zaszczepionych-jest-prawie-40-proc-osob/>

⁶⁰ The city is high in many rankings, e.g. in the ranking "Gmina good for living. The quality of life index in gminas in 2021" developed by Prof. Przemysław Śleszyński (Institute of Geography and Spatial Organization at the Polish Academy of Sciences) Sopot took 41st place out of 2477 gminas (in Pomerania only Gdańsk fared better with 28th place), while in the category of townships it was ranked 9th out of 66 compared locations.

young people who start a job or business that requires high skill. To a great extent, it plays the role of an exclusive "district" of the Tri-City, a place for people of high status, giving them a friendly space to live in, providing modern infrastructure, safety, access to education, healthcare, at the same time being an attractive cultural and recreational destination.

5. Challenges

The challenges faced by Sopot have been broken down into two groups. The group of existential challenges includes those whose importance seems to be the highest in the horizon beyond the time frame of the Strategy for 2030. The medium-term challenges are relatively urgent "tasks" to be carried out to significantly (positively) change the current situation by 2030.

Facing these challenges requires a long-term and integrated approach. The important factor here is the ability to properly recognise and thoughtfully react to new (sometimes shocking) external phenomena.

5.1. Existential challenges

a) Demographic balance and stopping the population shrinkage

Young people and families should have stronger incentives to stay or settle in Sopot and to get involved in the local affairs. Such incentives should entail suitable and accessible infrastructure (including housing) and services (educational, cultural and recreational), combined with support for social, professional and economic activity. An important role here can be played by activities addressed to foreigners (including students, migrants and refugees), young athletes, culture professionals, or people with high professional qualifications and competences who wish to tie their fate with Sopot for a long time.

b) Maintaining (improving) conditions and quality of life

Comprehensive and long-term actions regarding public safety, environmental and climate safety and health safety should be undertaken to provide the best possible quality of public services (education, healthcare, transport, cultural, recreational and other) while taking into consideration the needs of people of all age groups and the disadvantaged groups and promoting an active/healthy and environmentally conscious lifestyle of residents (and visitors). These actions should attract new residents, making Sopot a place more friendly to the concept of slow life, reconciling the vital interests of residents with the expectations of other "users" of the city.

c) Building resistance to crisis (resilience)

Sopot should become more resistant to the broadly defined effects of the climate crisis. At the same time, the city should strive to achieve climate neutrality and further reduce its negative environmental impact, which is a prerequisite for maintaining the attractiveness in terms of living and further growth. It will also be very important to deeply change the transport behaviour and get rid of the car-dependent mobility model.

5.2. Medium-term challenges

a) Transformation of the tourist profile

Sopot should focus on sustainable tourism, which can generate local economic benefits and minimise the negative impact on the quality of life and natural and cultural environment. Therefore, it is essential to provide optimal conditions for strengthening the health resort functions, including the broadly defined range of health services (including rehabilitation and prevention) for both tourists and residents of the city and the metropolitan area. Such targeted actions will allow the city to build a year-round offer for various groups, expand the range of services, change the city's image (breaking with negative stereotypes) and improve the quality of life among residents, including reduced negative impact of short-term rental on large scale.

b) Diversification of the economy

Sopot needs to strengthen the "non-tourism" sectors of the local economy to stabilise the tax base and improve its economic security. Therefore, steps should be taken to develop leisure services (which are created also by municipal cultural institutions, among others), creative industries, and to attract people engaged in free professions and the sector of the broadly defined silver economy. This should "rejuvenate" the local labour market and the age structure of the residents. A comprehensive offer will also be required to locate in the city businesses based on the ideas and enthusiasm of young people. At the same time, it would be worthwhile to support economic enterprises that are based on the ideas and activity of seniors (including the so-called "silver engineers").

c) Rational management of limited spatial resources

Because of little land available and considerable limitations resulting from the obligation to respect natural and cultural values, the city should launch effective tools for reducing and properly targeting the investment pressure and continue measures to prevent spatial chaos and the loss of landscape values. It is necessary to continuously improve the ability to make a long-term and sustainable use of the richness of natural resources (e.g. TPK forests) and unique facilities that make the city space attractive (such as the pier, hippodrome, Forest Opera, tennis courts, ERGO Arena).

d) Management and development of social capital

It is necessary to maintain civic participation at least maintain at the current level. The residents of Sopot should form a strong, sensitive and active civic community with an actual impact on the changes in the city, being open to external impulses and challenges. The needs of all groups of residents and other stakeholders (e.g. business, NGOs and universities) should be articulated and agreed from the bottom up in the participatory model of city development management, which would ensure more effective problem solving. It will be possible to fully unlock the city's social capital and civic participation provided that the (digital, spatial) availability of public services is ensured for all residents, including those of a lower financial status, the disabled, the sick and people in a homeless crisis. The city's social capital should also be enriched by new residents who can offer the local community their knowledge, experience and other resources after settling in Sopot.

e) Targets of cultural offer

Sopot faces the dilemma of choosing the right type of cultural offer (and to whom it should be addressed). There is no doubt that this offer is now diversified. However, it should be more conducive to building the image of the city as an aspirational place, friendly to artists and extraordinary artistic events addressed to residents that are actively and creatively involved in these events (paying particular attention to young people) as well as visitors.

f) Reinforcing the digital "fabric"

To take full advantage of the potential behind the development of technology and to increase the quality and attractiveness of life in the city, Sopot should "invest" in the digital competences of all residents and digitize each public service (also for visitors). It is also extremely important to create friendly conditions for people and enterprises that wish to develop their activities based on unrestricted access to high-quality digital infrastructure, open public data and digital competences of the local community.

II. MODEL OF FUNCTIONAL AND SPATIAL STRUCTURE

The model of the functional and spatial structure shows the potential transformations of the city space in response to long-term trends and development challenges, among other things. This is a point of reference for the goals of the Strategy (Chapter III) and is the basis for findings and recommendations for the spatial policy (Chapter IV).

1. Development directions for the functional and spatial structure

The development directions for the functional and spatial structure are specified in the current *Study of the conditions and directions of spatial development*⁶¹. 17 structural units of Sopot were considered. A spatial policy was adopted for each unit in accordance with the land development and designation. And so:

- 1.1. The letter R (R-1 - R-4) means multifunctional units, especially designated for the development of recreational and health resort functions⁶².
- 1.2. The letter C (C-1, C-2) means multifunctional units that form the city's service centre⁶³.
- 1.3. The letter M (M1–M7) means multifunctional units mainly intended for the residential function⁶⁴.
- 1.4. The letter P (P-1, P-2) means multifunctional units designated for the development of service functions regarding business environment, forming the service line – Administration and Business Axis⁶⁵.

More information can be found in Fig. 7.

⁶¹ Adopted by the resolution of the Sopot City Council No. XXXIX/522/2018 of 26 March 2018.

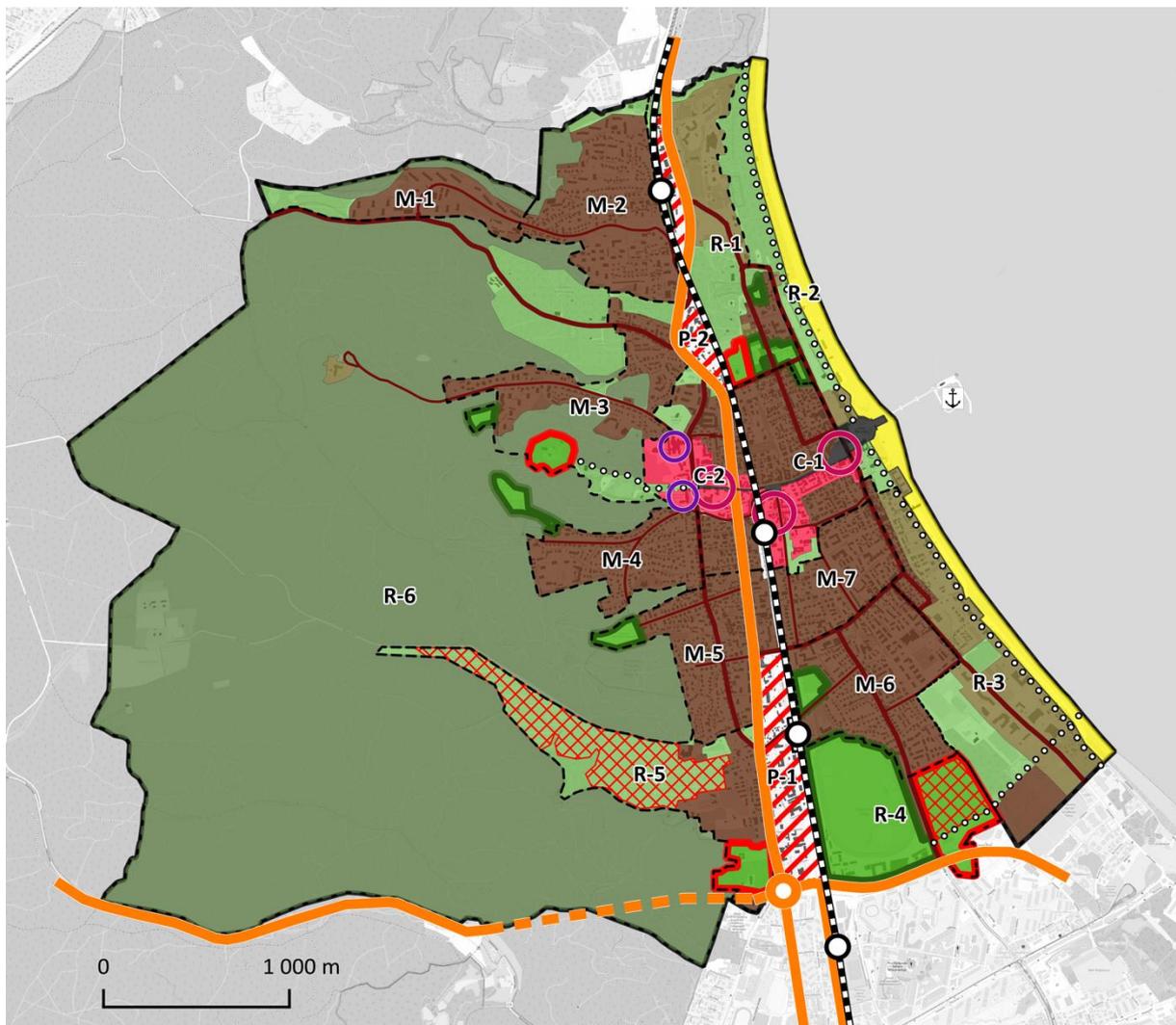
⁶² These are: R-1 Castle Hill – Grodzisko, R-2 North Seaside Belt, R-3 South Seaside Belt, R-4 Horse Racing – Łokietka, R-5 Świebrowska Valley, R-6 TPK.

⁶³ These are: C-1 Lower Sopot – centre and C-2 Upper Sopot – centre.

⁶⁴ These are: M-1 Brodwinio, M-2 Kamienny Potok, M-3 Przylesie – Okrężna, M-4 Abrahama – Mickiewiczza, M-5 Wybickiego – Kochanowskiego, M-6 Polna – 3 Maja, M-7 3 Maja – Chrobrego.

⁶⁵ These are: P-1 South Railway Corridor, P-2 North Railway Corridor.

Fig. 7. Development directions for the functional and spatial structure.



FUNCTIONAL AREAS

- residential and service development areas
- tourism, recreation and spa development areas
- city centre areas
- downtown pedestrian route
- concentration of centre-forming services
- concentration of science services
- service line - "Administration and Business Axis"
- areas of supralocal services with a predominance
- supralocal sports areas
- beaches and dunes
- forests
- allotment gardens
- other green areas, including parks, local sports centres and cemeteries

STRUCTURAL UNITS AND THEIR FUNCTIONAL DESIGNATIONS

- - - - borders of urban units
- R** - multifunctional with a predominance of recreational and spa functions
- C** - multifunctional forming the city centre
- M** - multifunctional with a predominance of residential function
- P** - multifunctional with preferences for the development of administrative and business functions

TRANSPORT

- main roads
- main roads in the tunnel
- service roads
- local roads
- railway line
- railway stations/transport hubs
- ⚓ coastal shipping terminal
- main recreational and walking paths

Source: own study based on the *Study of the conditions and directions of spatial development of the city of Sopot*, March 2018.

2. Development directions for transport systems and technical infrastructure

The development directions for transport systems and technical infrastructure are also specified in the *Study of the conditions and directions of spatial development*.

2.1. The basic planned street layout for the city area is as follows:

- Trasa Średnicowa (Red Road): G 2/2 class main road. A tunnel route with two junctions at the entrances to the city is being ultimately considered in the area of Sopot: on the southern side with the Zielona-Nowa Spacerowa Road, on the north side, in the vicinity of the intersection of Haffner Steet and Niepodległości Avenue⁶⁶.
- Nowa Spacerowa (Green Road): G 2/2 class main road. It will run along the border with Gdańsk, requires the construction of the so-called tunnel under Pacholek, which will be 1,300 m long.
- Al. Niepodległości: G 2/2 and G 1/2 class main road. After completion of the said Red Road it will become a service road (recommended class Z 2/2 and Z 1/2).
- a series of service roads⁶⁷

2.2. The layout of the railway infrastructure in the city area consists of two parallel railway lines:

- No. 202: Gdańsk Główny – Stargard: including Sopot station. This line connects the city with the national network and also the Trans-European Transport Network (TEN-t).
- No. 250: Gdańsk Śródmieście – Rumia: an agglomeration railway line managed by Szybka Kolej Miejska, with stops: Sopot Wyścigi, Sopot and Sopot Kamienny Potok.

2.3. The system of public transport is based on the agglomeration railway and bus and trolleybus transport organised by ZTM Gdańsk and ZKM Gdynia. There are plans to develop trolleybus lines, lines operated by electric vehicles or light buses with environmentally-friendly engines, as well as to construct/expand the local transport hubs: Sopot Wyścigi and Sopot Kamienny Potok, which will be used next to the existing transport hub of metropolitan importance at the Sopot station. Coastal shipping, which is attractive to tourists, may also have some transport potential.

2.4. The infrastructure for bicycle traffic is developed (international bicycle route R10 of the EuroVelo network runs through Sopot). It is planned to extend it (municipal and forest bicycle paths) and equip it with parking spaces for bicycles. The introduction of the Tempo 30 traffic calmed areas will improve the safety of cyclists and pedestrians.

2.5. The system of roads and pedestrian areas is well-developed. It includes the promenade at Bohaterów Monte Cassino Street connecting the pier with the Forest Opera and the beach alley. It is planned to create new zones with priority for pedestrian and bicycle traffic (city centre area) and connect the Hippodrome to the beach through a new pedestrian path (Ergo Arena area).

⁶⁶ The technical solutions and options for implementing the planned tunnel under Sopot (Red Road) and the tunnel under Pacholek require arrangements between gminas under the long-term transport policy for the metropolitan area.

⁶⁷ These are the following streets: Bitwy pod Płowcami, Grunwaldzka, Powstańców Warszawy, Jana Jerzego Haffnera, Jakuba Goyki, 3 Maja, Władysława Łokietka, Władysława IV, Jacka Malczewskiego, Armii Krajowej and Władysława Sikorskiego.

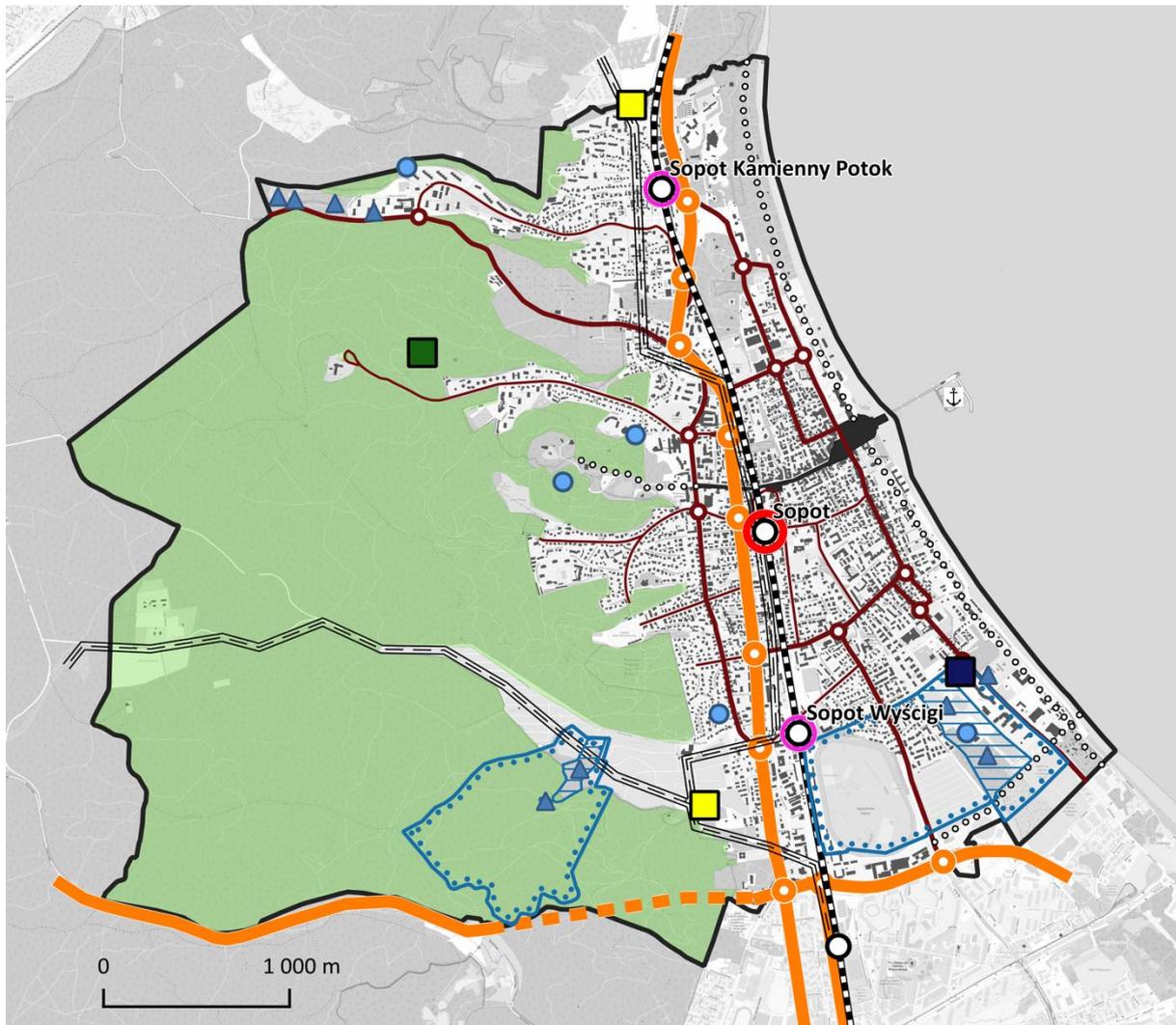
2.6. When it comes to the development of technical infrastructure systems⁶⁸, the following are planned:

- modernisation of water intakes, surge tanks and water supply system;
- improvement of the sewage and rainwater drainage system (replacements, modernisation, construction of sanitary and rainwater sewers);
- extending the range of the central heat supply system;
- expansion of the “Sopot” 110/15 kV main power supply station in connection with the reconstruction of 110 kV power lines and the replacement of overhead lines with cable lines,
- promoting the use of solar energy for generating hot water, supporting the heating of buildings and producing electricity.

More information can be found in Fig. 8.

⁶⁸ Sopot is within the reach of supra-local water supply and sewage disposal and neutralisation systems (it does not have its own sewage treatment plant, so waste is transferred to the "Wschód" sewage treatment plant in Gdańsk) . Waste from Sopot is managed by Eko-Dolina, a regional facility for the treatment of municipal waste in the Gmina of Wejherowo. Heat is supplied by the district heating system in Gdańsk, while electricity and gas are provided from a national mains.

Fig. 8. Development directions for transport systems and technical infrastructure.



TRANSPORT

- main roads
- main roads in the tunnel
- major intersections and junctions
- service roads
- local roads
- selected intersections
- railway line
- train station and SKM stops
- transport hubs of local importance
- transport hub of metropolitan importance
- coastal shipping terminal
- main recreational and walking paths
- downtown pedestrian route

TECHNICAL INFRASTRUCTURE ELEMENTS

- water intakes
- treatment stations, tanks, pumping stations
- borders of indirect water intake protection
- area of direct water intake protection
- main sewage pumping station
- 110kV overhead power line with a protection area
- 110/32kV transformer station (GPZ)
- organic waste storage site

Source: own study based on the *Study of the conditions and directions of spatial development of the city of Sopot*, March 2018.

III. GOALS

A general objective (vision) and strategic goals for Sopot until 2030 was formulated according to the diagnostic work and on the basis of the defined challenges and long-term trends and predictions regarding changes in important development conditions and considering the development directions for the functional and spatial structure as well as transport systems and technical infrastructure presented in Chapter II.

1. General objective (vision)

The vision of Sopot in 2030 can be presented on three levels. These are the fundamental features of the city, its aspirations and external relations. This systematics was used for formulating the following general objective for Sopot.

SOPOT in 2030 is:

FUNDAMENTAL FEATURES

- a. A city where the process of depopulation and ageing has been slowed down by opening up to new residents from Poland and foreigners (including refugees). A city that maintains the foundations of social and economic development and the ability to provide high-quality public services, remaining the national leader in the quality of life and balancing the needs of all generations.
- b. A city of active, aware and organised citizens that participate in establishing the directions of its development and take part in taking and implementing key decisions.
- c. A city that reinforces the loyalty of its residents, treats their needs and problems as a starting point for its policies, but is also open to the needs of external people and institutions.
- d. A city that refers to the culture, traditions and symbols of a seaside health resort, for which all activities related to relaxation, health and quality of life are the basis of continuity and growth.

ASPIRATIONS

- e. A city without barriers – fully accessible to people with special needs, offering friendly public services, provided also by digital means and in a de-institutionalized form whenever possible.
- f. A compact (15-minute) city where pedestrian and bicycle traffic (individual active mobility) and public transport have priority over car traffic.
- g. A city aiming at "zero emission", taking active mitigation and adaptation measures regarding climate crisis and treating its natural resources as the foundation for good quality of life and health of its residents.
- h. A city that offers a diverse and high-quality education, culture and sports, combined with leisure services, being capable of attracting new "users", including new (also younger) residents.

- i. A city that strengthens its spa functions (health resort) and expands the portfolio of health-oriented services and services comprehensively focused on the needs of the "silver" population.
- j. A city that develops sustainable tourism and allows the visitors to reasonably benefit from cultural and natural heritage, in line with the long-term development interest of the local community.
- k. A city with a broad (diversified) economic base, friendly to "clean" technologies, young and unusual companies, providing access to the highest-quality business services, talents and competences.

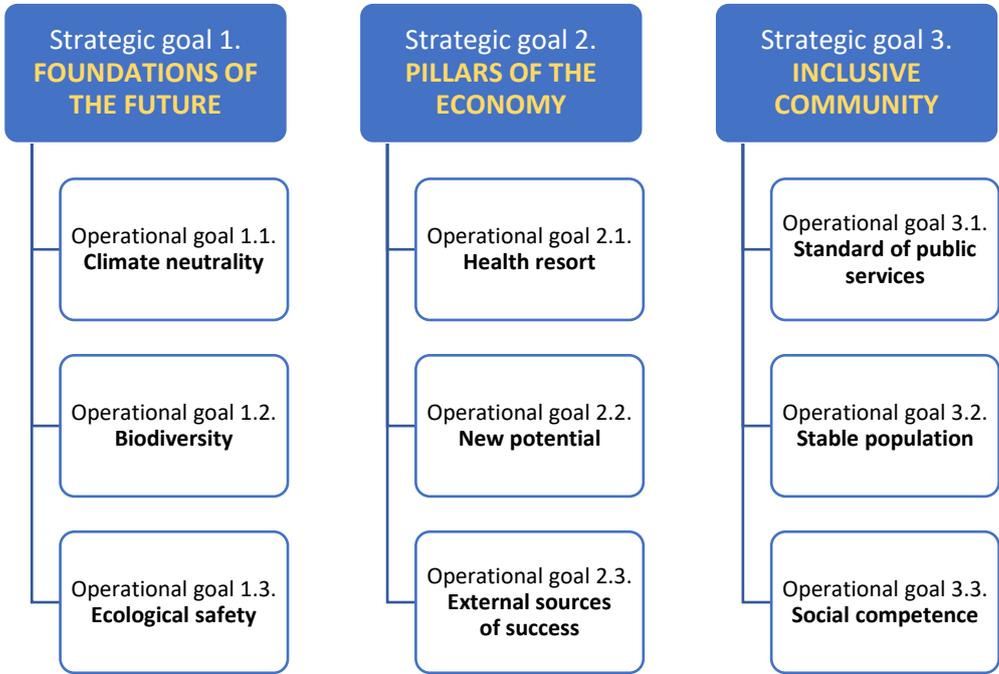
EXTERNAL RELATIONS

- l. A city that builds its brand and benefits from its location in the centre of the metropolitan area, providing services to the metropolis, but also taking advantage of a wide range of opportunities and services offered to its residents in the metropolitan area.
- m. A city that plays the role of a *laboratory* for systemic changes, which implements or proposes innovative social and economic solutions, also with regard to the functioning of local self-government communities and the reduction of their environmental impact.

2. Strategic and operational goals and directions of activities

Below are the strategic and operational goals along with the main directions of activities.

Fig. 9. Goal grid.



Source: own study.

STRATEGIC GOAL 1. FOUNDATIONS OF THE FUTURE

The implementation of this goal results from the belief that it is necessary to:

- a) reduce the negative impact on and protect the environment, improving the ecological conditions of living;
- b) build resilience to the effects of the climate crisis, striving for climate neutrality;
- c) introduce a new standard of mobility, which is no longer dependent on cars;
- d) focus on renewable energy on a local scale, striving for energy autonomy.

Operational goal 1.1. Climate neutrality

Main directions of activities:

1.1.1. Priority for public transport.

- a. Full integration with the public transport system in the metropolitan area⁶⁹.
- b. Improving the spatial accessibility and frequency of transport.
- c. Promoting zero-emission rolling stock and its adaptation to local conditions.
- d. Modernisation of the street system for the needs of public transport.

1.1.2. Changing the model of individual mobility⁷⁰.

- a. Establishing a clean transport zone and excluding most of the lower city from car traffic.
- b. New zones with priority for pedestrian and cycling traffic, integration of pedestrian and cycling routes.
- c. Expanding and fitting bicycle paths and transforming them into a coherent network.
- d. Development of systems for sharing various means of transport.
- e. Facilitations for the transport of bicycles using public transport.
- f. Strengthening the system of incentives to reduce the use of cars.
- g. Development of a "green" transport system from interchange junctions and peripheral parking lots to the centre.

1.1.3. Supporting various forms of electricity generation based on RES (businesses, residents, public sector).

1.1.4. Transformation of buildings (including public ones) into zero-energy and plus-energy buildings.

1.1.5. Gradual elimination of point sources of carbon dioxide emissions.

Operational goal 1.2. Biodiversity

Main directions of activities:

1.2.1. Increasing the share of biologically active areas in urban and private regions.

1.2.2. Improving the management of green areas (including forests) and coastal areas (including dunes).

⁶⁹ Including the full use of the agglomeration railway potential and the improvement of the functionality of its hubs.

⁷⁰ The implementation of these postulates will require detailed planning, a sufficient preparatory period and possibly a decision of the residents expressed in a referendum.

1.2.3. Changing the goals, tasks and methods of forest management at the TPK.

1.2.4. New nature conservation areas and facilities (reserves, ecological sites, nature and landscape complexes, and natural monuments)

1.2.5. Protection of areas generating fresh/cool air and ventilation corridors.

Operational goal 1.3. Ecological safety

Main directions of activities:

1.3.1. Using a centralised system for heat supply.

1.3.2. Expansion of the power grid and its adaptation to connecting new RES capacity (prosumer systems).

1.3.3. Maintaining access to high-quality drinking water.

1.3.4. Maintaining the efficiency and reliability of the sewage and rainwater drainage system.

- a. Widespread involvement of residents in strengthening the surface water retention system.
- b. Reducing the size (range) of impervious surfaces.

1.3.5. Protection against sea flooding.

1.3.6. New elements of green and blue infrastructure; elimination of urban heat islands.

1.3.7. Improving the quality of waste management, increasing the collection selectivity.

1.3.8. Lowering the impact of transit traffic, including the reduction of noise generated by transit routes.

STRATEGIC GOAL 2. PILLARS OF THE ECONOMY

The implementation of this goal results from the belief that it is necessary to:

- a) strengthen the health resort offer,
- b) move away from the primacy of mass tourism, developing a high-quality, year-round leisure offer for various groups (including foreign ones);
- c) establish conditions for multi-sector economic growth, especially innovative economic and social initiatives by attracting talents;
- d) have a positive impact on the external environment to meet long-term needs.

Operational goal 2.1. Health resort

Main directions of activities:

2.1.1. Development of generally accessible spa-related infrastructure.

2.1.2. Full use (development) of the brine potential.

2.1.3. Diversifying the offer and improving the quality health resort services provided by the city

2.1.4. Establishing conditions for expanding the range of spa services and target groups.

Operational goal 2.2. New potential

Main directions of activities:

- 2.2.1. Strengthening the role of Sopot on the scale of the metropolitan area and Poland
 - a. Nurturing the quality and diversity of culture.
 - b. Strengthening the economic and cultural aspect of Sopot's iconic attractions.
 - c. Creating a culinary "corner" based on quality, variety and the local supply chain.
- 2.2.2. Building a unique (at least in Poland) sustainable tourism with an important share of health, medical and spa tourism.
- 2.2.3. A support system in launching and networking companies around universities.
- 2.2.4. A system of incentives for locating and developing "non-tourism" companies characterised by a low carbon footprint.

Operational goal 2.3. External sources of success

Main directions of activities:

- 2.3.1. Strengthening long-term cooperation and reducing conflicts in the metropolitan area.
 - a. Effective, safe and zero-emission public transport system (plus an integrated ticket).
 - b. A coalition to protect the values of the TPK by establishing new nature reserves on its territory and changing the goals and principles of forest management.
- 2.3.2. Launching a nationwide legislative initiative to reduce the negative impact of short-term rental on the social and economic condition of cities.
- 2.3.3. Participation in international cooperation networks to improve the condition of the Baltic ecosystem.

STRATEGIC GOAL 3. INCLUSIVE COMMUNITY

The implementation of this goal results from the belief that it is necessary to:

- a) balance the needs of different generations while laying the foundations for an inclusive community;
- b) implement a modern housing policy to stabilise the number of residents by building new flats for people with various incomes, including foreigners;
- c) open up to migrants and refugees (including students) by giving them the chance to settle in Sopot;
- d) rely on cultural activity and education by attempting to solve problems, build awareness and encourage cooperation between various people and groups;
- e) improve the participatory model of development management.

Operational goal 3.1. Standard of public services (*Charter of obligations*)

Main directions of activities:

3.1.1. Guaranteed social security.

- a. A support system based on the work of assistants to people in need.
- b. Providing respite aid for carers of people in need.
- c. Development of various forms of assisted housing.
- d. Ensuring access to health services and e-administration facilities.
- e. Launching a care and treatment facility.
- f. Social entrepreneurship incubator as a vehicle supporting the integration of people in the local community.

3.1.2. Guaranteed quality and accessibility of public services addressed to young people.

3.1.3. Considering the nature of new residents of Sopot from other countries in the range of public services

3.1.4. A healthy lifestyle support program for all groups of residents.

- a. Promotion of sport, active leisure and healthy eating habits.
- b. Enriching the generally available sports and recreational offer and supplementing the infrastructure.
- c. Mechanisms that facilitate full access to the benefits of the health resort and the cultural offer.
- d. Modern health programs (for preventive/diagnostic purposes), including health education.

3.1.5. A program of care and educational services for children in Sopot, including children from other countries

3.1.6. Full digitisation of public services while maintaining their user-friendliness.

3.1.7. Modernisation of the City Hall by improving accessibility and functionality.

Operational goal 3.2. Stable population

Main directions of activities:

3.2.1. A program of incentives to stay / settle in the city, based on the available social housing.

- a. Long-term active management of social housing, generally without the option of purchase.
- b. Development of vacant buildings.
- c. Improving the technical condition of flats in old buildings.
- d. Flat swap system (adjusting the potential to the needs of tenants).
- e. Modification of the housing allocation principles to include the pool of flats intended for people from outside Sopot, including foreigners.

3.2.2. TA program for positioning Sopot among various target groups (based on the quality of life).

- a. Counteracting the "dislocation of residents" (improving access to and promoting public services).
- b. "Anchoring" university graduates from outside Sopot.
- c. Attracting new residents, including from abroad, and creating conditions for their full integration
- d. Encouraging "returns" of former residents.

Operational goal 3.3. Social competence

Main directions of activities:

- 3.3.1. Support for the development of civic organizations.
- 3.3.2. New mechanisms for the participation by residents in developing and implementing city policies.
- 3.3.3. Enriching social capital through cultural activity.
- 3.3.4. Involving children and young people in making decisions important for the city.
- 3.3.5. Sopot recognised as a Child Friendly City under the UNICEF initiative
- 3.3.6. Development of various tools for participation and social education, including a civic budget.
- 3.3.7. Support for schools and parents in building civic competences among children and adolescents.

3. Progress indicators

The following indicators have been adopted for fulfilment of strategic goals. They are a starting point for activities aimed at monitoring and evaluation of the Strategy implementation. It is assumed that they will be measured every 2-3 years⁷¹.

Table 1. Strategic goals and indicators of their completion.

Indicator	Trend in the period of 2022-2030
Strategic goal 1: FOUNDATIONS OF THE FUTURE	
Annual greenhouse gas emissions (tonnes of CO ₂ e)	↓
Share of pedestrian, bicycle, scooter and public transport traffic in the total traffic volume	↑
Capacity of devices generating electricity from RES	↑
Biologically active locations in the total city area (%)	↑
Total retention capacity of the city (m ³)	↑
Share of waste collected selectively in total waste (%)	↑
Number of days of exceeded standards for suspended dust concentrations as per WHO (days)	↓
Strategic goal 2: PILLARS OF THE ECONOMY	
Number of users of spa services (persons)	↑

⁷¹ The proposed indicators presented in Table 1 are preliminary measures. They will be specified in more detail and verified before adopting the Strategy. Furthermore, it will be necessary to assign specific and reliable data sources to them. Ultimately – at the working level – a metric should also be created for each indicator to avoid interpretation doubts at the Strategy implementation stage.

Economic entities in selected PKD classification sections – tourism, gastronomy, culture, entertainment, recreation, healthcare, social assistance	↑
Number of off-season tourists compared to the total number of tourists (%)	↑
Total number of taxpayers earning income by running a business and CIT payers	↑
Strategic goal 3: INCLUSIVE COMMUNITY	
Number of people using social assistance	↓
Demographic dependency ratio / the ratio of the number of people in non-working age to the number of people in working age / (%)	↑
Participation of residents in voting on the Civic Budget	↑
Number of new social housing flats	↑

Source: own study.

4. Areas of strategic intervention (ASI)

ASI are areas that:

- a) feature identified or potential functional relationships, or
- b) stand out with particular social, economic or spatial conditions, determining the presence of specific barriers to development, or finally
- c) show continuing and activable development potential.

From the perspective of the region, the *Pomeranian Voivodeship Development Strategy until 2030*⁷² does not indicate any ASIs assigned solely to the territory of Sopot.

However, from the city's point of view, three key ASIs can be identified, as described below.

a. Lower City:

Reasons for assignment:

The need to improve the attractiveness and quality of the environment in the area of key importance for the spa and tourist functions of the city.

b. South:

Reasons for assignment:

Possibility and purposefulness of using the sparse available land for constructing buildings for mixed functions with a significant share of residential function.

c. Central Corridor:

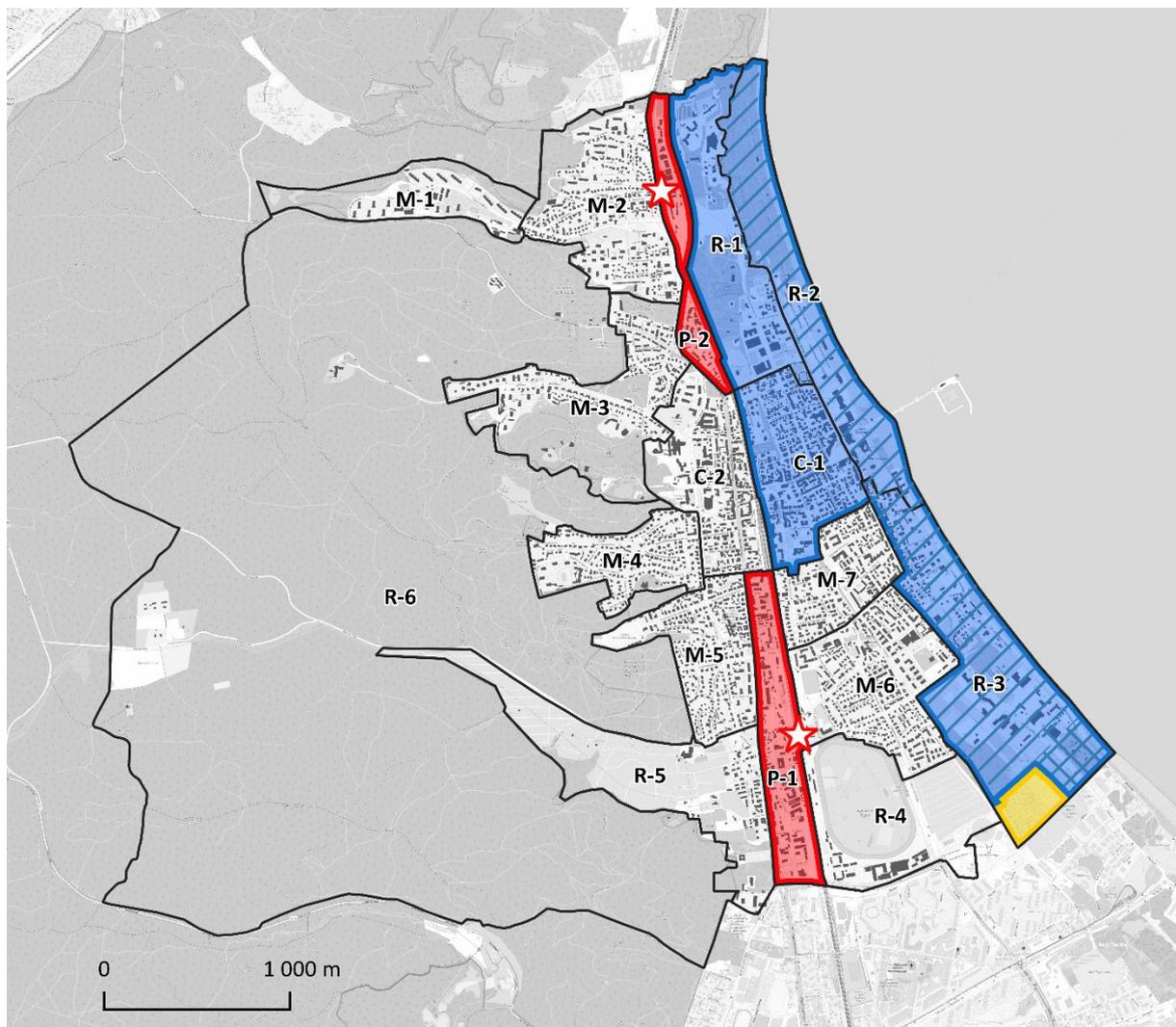
⁷² Adopted by the resolution of the Pomeranian Voivodeship Council No. 376/XXXI/21 of 12/04/2021.

Reasons for assignment:

The need to organise the extensively developed service and production areas, including the improvement of investment opportunities while maintaining valuable functions and development elements and allowing for the residential function.

More information can be found in Fig. 10.

Fig. 10. Areas of strategic intervention.



AREAS OF STRATEGIC INTERVENTION

-  I ASI - Lower City
-  II ASI - South
-  III ASI - Central Corridor
-  health resort zone A1
-  local transport hubs
-  proposed extension of health resort zone A1

Source: own study.

ASIs are locations where it is particularly important to effectively coordinate and concentrate a package (bundle) of diverse (multi-sectoral) activities for the implementation of the Strategy's goals in these areas. Therefore, the key organisational, regulatory and investment activities to be carried out to implement the Strategy have been specified for each ASI (see Table 2).

Table 2. Identified ASIs.

ASI	Assumed (organizational and regulatory) activities	Investment activities (directions of the Strategy activities)
Lower City	<ol style="list-style-type: none"> 1. Expanding the pedestrian-friendly zones by expanding car-free or restricted traffic zones. 2. Reducing the number of required new parking spaces for facilities located in zones with good pedestrian accessibility. 3. Making public spaces more attractive and increasing their quality. 4. Maintaining green areas and active protection of natural environment elements while keeping them available for use. 	1.1.1, 1.1.2, 1.1.3, 1.2.1, 1.2.2, 1.2.4, 1.3.1, 1.3.2, 1.3.3, 1.3.4, 1.3.5, 1.3.6
South	<ol style="list-style-type: none"> 1. Selecting a development concept and introducing changes to zoning acts. 2. Preparation of offers for investors, taking into account the need for building social housing. 3. Concluding relevant contracts or agreements, implementation. 	1.2.1 3.2.1, 3.2.2, 3.3.2, 3.3.3, 3.3.4
Central Corridor	<ol style="list-style-type: none"> 1. Recognising the possibility of introducing complementary housing and service buildings or flats in service structures. 2. Starting a dialogue between public institutions, social organisations, representatives of the economy and other stakeholders on the local development. 3. Support for consolidation activities and post-consolidation development in areas with mixed functions. 	1.1.1, 1.1.2, 1.2.1, 1.2.4. 1.3.1., 1.3.6, 1.3.8 3.2.1, 3.2.2, 3.3.2, 3.3.3, 3.3.4

Source: own study.

IV. FINDINGS AND RECOMMENDATIONS FOR THE SPATIAL POLICY

The model of the functional and spatial structure in Chapter II and the goals described in Chapter III are the basis for these findings and recommendations.

The spatial policy will be guided by four equal principles:

- A. Protection of compact building design.
- B. Creating multi-functional and socially diverse building complexes.
- C. Protection of natural environment resources, landscape and cultural heritage sites (improving ecological living conditions).
- D. Priority for pedestrian, cycling and public transport traffic.

Below are the key findings and recommendations for developing and pursuing the spatial policy of Sopot related to the application of the said principles.

Table 3. Findings and recommendations (A).

PRINCIPLE A. Protection of compact building design	
Findings and recommendations	1. Continuing to implement the idea of a "15-minute city" while maintaining or strengthening local facilities and service centres (achieving a 600-metre service range, corresponding to a 10-minute walk).
	2. Exercising particular caution when designating and managing undeveloped areas owned by gmina (small % of the city area).
	3. Stopping the increase in the intensity of development aimed at the maximisation of economic effects (determining limits of investment capacity)

Source: own study.

Table 4. Findings and recommendations (B).

PRINCIPLE B. Creating multi-functional and socially diverse building complexes	
Findings and recommendations	1. Planning multi-functional building complexes conducive to social integration and all-day activity of users, offering access to services, housing and job opportunities for social groups with different needs and income (preventing the "luxury" enclaves, such as gated estates).
	2. Maintaining and developing public spaces whose development is conducive to building and strengthening interpersonal relations.
	3. Expanding the range of functions in the existing and planned development structures as a condition for their attractiveness for various groups of users, active at different times of the day/week/year. Support in maintaining the existing and valuable functions and activities in all parts of the city, which applies mainly to the actual residential function.
	4. Ensuring the availability of flats in various standards and treating the residential function as basic or secondary in all building complexes.
	5. Considering all available land primarily in view of new flats, mainly social housing.
	6. Verification (more flexibility) of spatial development directions for structural units with preferred development of administrative and business functions ⁷³ in terms of partial use of these areas as locations for housing construction (while using noise protection solutions).
	7. Providing residents with large green space as well as sports and recreational areas at the municipal level and as part of housing estates / multi-family housing areas.
	8. Introducing local green islands (such as pocket parks) in compact development areas, which will have an impact on air purification/humidification, water retention and temperature reduction, making integration easier for residents.

Source: own study.

⁷³ Marked by letter P in the *Study of the conditions and directions of spatial development of the city of Sopot*, March 2018.

Table 5. Findings and recommendations (C).

PRINCIPLE C. Protection of the natural environment, landscape and cultural heritage sites	
Findings and recommendations	1. Reinforcing the city's ecological system composed of elements of regional ⁷⁴ , subregional ⁷⁵ and local ⁷⁶ importance.
	2. Respecting the prohibitions and restrictions resulting from the established forms of protection and introducing the legal protection of further particularly valuable natural areas and sites ⁷⁷ .
	3. Protection of the sea shore and protection of health resort areas.
	4. Restoring functions and aesthetics to neglected elements of urban green infrastructure, adding greenery to public spaces.
	5. Establishing the principle that the minimum percentage of green area in new project areas must meet the requirements in this regard for the health resort protection zones ⁷⁸ .
	6. Changing the goals, tasks and methods of forest management in the TPK and creating the conditions for a more complete use of the TPK forests for the health and recreation of residents and tourists.
	7. Promotion of photovoltaic prosumer systems.
	8. Respecting the requirements resulting from the established forms of monument conservation and the gradual expansion of the list of sites under conservation.
	9. Restoration and modernisation (adaptation to contemporary needs) of sites of local cultural value, landscape urban concepts, villa and garden complexes, manor and park, park and garden concepts as well as historic elements of the terrain layout, greenery, water courses and water reservoirs.
	10. Maintaining the character of architecture and the scale of buildings from the turn of the 19th century and the principles of historical urban composition, including the layout of streets and squares.
	11. Respecting the historical valorisation of the spatial structure and the recommendations for spatial management introduced by the provisions of the Study of the conditions and directions of spatial development of the city of Sopot.

Source: own study.

⁷⁴ Coastal area of the sea and forests within the moraine plateau and its edge zone.

⁷⁵ Swelina ecological corridor.

⁷⁶ Ecological micro-areas of small forest and semi-forest complexes, urban green areas, such as parks, squares, lawns, street rows of trees, etc., and landscaped green areas accompanying cultural and public buildings, ecological corridors of streams, the Sopot Cliff.

⁷⁷ Sopot features trees proposed for protection as natural monuments, among others.

⁷⁸ This means: 65% in zone A, 50% in zone B and 45% in zone C.

Table 6. Findings and recommendations (D).

PRINCIPLE D. Priority for pedestrian, cycling and public transport traffic.	
Findings and recommendations	1. Introducing pedestrian and cyclist-friendly solutions, including the limited sizes of city blocks and ensuring safe “shortcuts”.
	2. Minimising the area occupied by roads and intersections, leaving a comfortable space for pedestrians, cyclists, people with disabilities, the elderly and public transport (including convenient location and stops, green belts as well as short and single-level pedestrian crossings at intersections).
	3. Reducing the occupancy of areas by parking lots accompanying new projects (using underground/above-ground parking lots, e.g. above service ground floors) ⁷⁹ .
	4. Changing the organisation of traffic on selected sections of streets to restrict the access of cars to the health resort protection zones and pedestrian zones by applying a parking ban and reducing the availability of parking spaces; construction of pedestrian walkways; expanding residential zones (rate 20) and the so-called woonerfs; construction of deceleration platforms and roundabouts.
	5. Comprehensive support for sustainable mobility through: a) zone-based parking fees and transport from parking lots outside the city centre; b) moving away from the construction of new street parking spaces, parking bays and city car parks; c) reducing the number of required parking spaces for sites located in zones with good pedestrian access; d) gradual exclusion of subsequent city centre streets from traffic (transforming the road into public space); e) implementation of a smart parking area management system; f) organisation of bicycle parking spaces and kiss&ride parking areas instead of park&ride solutions.

Source: own study.

⁷⁹ It seems necessary to verify the findings of the Study of the conditions and directions of spatial development.

V. IMPLEMENTATION SYSTEM

The implementation system will determine the success of the Strategy. It identifies the essential entities, processes and documents related to effective Strategy management.

1. Structure and principles of implementation

1.1. Key entities and their competences

The following will be directly involved in the implementation of the Strategy:

- 1) Sopot City Council (SCC);
- 2) The Mayor of the City of Sopot (MCS) together with the Sopot City Hall (SCH);
- 3) Other entities carrying out the city tasks⁸⁰.

As part of its competencies, the SCC will in particular:

- a) get familiar with the progress of the Strategy and arrange debates on this matter⁸¹;
- b) express opinions on the conclusions presented by the MCS on the Strategy implementation;
- c) secure the financial needs related to the Strategy's goals in relation to the city budget and the long-term financial forecast (LFF);
- d) identify and inspire projects that fit into the implementation of the Strategy's goals;
- e) undertake other necessary actions for the achievement of the Strategy's goals;
- f) make decisions about changing the Strategy, specifying the manner, schedule and sources of funding in this regard.

As part of its competencies, the MCS will in particular:

- a) initiate, approve and supervise the implementation of the Plan of Actions and projects related to the Strategy implementation;
- b) ensure that the said Plan and projects have the right impact on the city budget and the LFF;
- c) identify optimal sources of financial support for projects that implement the Strategy's goals;
- d) take corrective (remedial) actions in the case of major deviations or materialization of risks related to the implementation of the said Plan and projects;
- e) build platforms for cooperation with a wide range of Strategy Stakeholders;

⁸⁰ These are municipal companies and other entities (e.g. budgetary units, schools) supervised by the MCS.

⁸¹ The format, nature and frequency of these debates will be agreed between the Chairman of the SCC and the MCS.

f) regularly survey the opinion of the residents on the manner, pace and effects of the Strategy implementation.

1.2. Strategy Steering Group (SSG), project managers, project teams

The work of the SSG will be managed by the MCS or their representative. The main responsibility of the SSG will be to coordinate activities and exchange information on the Strategy implementation. The SSG will consist of 10-12 key MCS associates⁸². Efficient operation of the SSG will determine the dynamics and effectiveness of the preparation and implementation of strategic development projects, which will be managed by project managers and their subordinate project teams.

The SSG will include a group designated for analysis and response to long-term crises. Its task will be to prepare urban structures for a strategic response to major external impulses (shocks, stresses) that may affect Sopot in the future.

1.3. Action Plan (AP)

The AP will take the form of an ordinance by the MCS. It will be a continuous (rolling) plan, with a 2-year implementation horizon and an annual update. Its purpose will be to specify the provisions of the Strategy, mainly by identifying projects and tasks to be carried out in the next 2 years. The tasks defined in the AP will be closely related to the city budget and the LFF (larger investment projects).

The AP should be developed within 3 months after adopting the Strategy. It will be updated in parallel to the budget preparation procedure for the sake of compatibility between operational and financial planning, but it will also be possible to update the AP on other dates.

1.4. Stakeholder engagement, Strategy Council (SC)

During the Strategy implementation there will be a continuous mechanism for active inclusion of a number of Stakeholders. They will represent civic organisations, the economic sector and other important public life institutions in Sopot. Their representatives will form the SC, which will be appointed by the MCS to act as an opinion-making and advisory body for matters related to the Strategy implementation. The SC will be able to recommend launching projects of strategic importance for the city and making modifications to the Strategy or its implementation mechanisms.

In addition to the SC, less institutionalised forms of stakeholder involvement in the discussion and decisions important for Sopot will be used, including in the implementation and evaluation of the progress of the Strategy⁸³. At the same time, regular information activities in an interesting (engaging) form will be taken to increase the knowledge of the residents of Sopot about the effects of the projects carried out under the Strategy.

⁸² The principles of operation of the SSG and its composition will be governed by an Ordinance of the MCS. When needed, people from outside the SSG can be invited to participate in its work.

⁸³ They can take various forms, such as: 1) a system for collecting, selecting and supporting valuable local ideas that are in line with the Strategy's goals; 2) opinion polls (referenda) on important long-term/cost-intensive decisions affecting the entire city; 3) competitions, the results of which may inspire residents, NGOs, companies and other institutions in the city to act in accordance with the Strategy's goals to give tangible and lasting benefits for the local community.

1.5. Strategy updates

At least every 2 years, the Strategy will be subject to in-depth reflection (evaluation, review) by the SCC. This might give reasons for updating the Strategy. The update process will start with the SCC decision upon request or after consultation with the MCS.

2. Monitoring and evaluation

The Strategy implementation will be monitored and evaluated. This is due to the requirement to have knowledge about the progress in achieving strategic goals, and on the other hand, it makes it possible to efficiently adapt to the changing development conditions and draw conclusions based on the experience gathered during implementation.

2.1. Monitoring – Strategy progress report (SPR)

The SSG is responsible for monitoring the progress of the Strategy implementation. A SPR approved by the MCS will be created every year. The first RSRS will be developed in 2024.

Each SPR will include at least the following:

- a) observed social and economic changes;
- b) identified (new) external conditions for development;
- c) analysis of changes in the indicators related to progress of strategic goals⁸⁴;
- d) analysis of (financial and material) progress in the implementation of strategic projects, including identified implementation problems.

The SPR will be prepared together with the *Report on the status of gmina*. The content of the SPR will be discussed in the SCC forum with the SC and other Stakeholders. The conclusions from the SPR may be the basis for starting evaluation activities or for changing the mechanisms for Strategy implementation.

2.2. Evaluation

The Strategy implementation will be subject to periodic evaluation from the point of view of achieved results and management mechanisms. Evaluation activities (including research) will provide reliable and useful information (including clarifications), conclusions and recommendations concerning:

- verification of the goals or directions of activities adopted in the Strategy;
- modification of the mechanisms and tools used to implement the Strategy;
- modification, cancellation or launching of new projects that are in line with the Strategy's objectives;
- Strategy updates.

⁸⁴ The starting point will be the indicators defined in Chapter III. GOALS (point 3. Progress indicators). They will be supplemented with the so-called "product" indicators for evaluating the progress of the Strategy implementation in shorter (e.g. annual) periods.

Evaluation will generally be carried out using six criteria:

- 1) effectiveness (progress of the adopted goals and implementation mechanisms);
- 2) efficiency (relation: input-effect);
- 3) relevance (adequacy of goals and tools to the diagnosed problems);
- 4) impact (scale and strength of influence);
- 5) durability (continuity of effects);
- 6) usability (response to actual needs).

Evaluation will generally be done:

- a) by the SSG / SCH – in the case of (current) operational evaluation;
- b) by external experts – in the case of summary (strategic) evaluations every 2 years.

Decisions to start the evaluation will be made by the MCS at the request of the SSG.

The evaluation can also be initiated by the SCC or the SC.

Evaluation recommendations will be presented by the MCS on the SCC forum together with information on how to use them (reasons for not using them).

The budget for evaluation activities will be determined annually, starting in 2024.

3. Guidelines for executive documents

Within 3 months of adopting the Strategy, the MCS will approve the catalogue of executive documents proposed by the SSG, including the rules for their development, implementation and reporting. This catalogue will include at least the above-mentioned Action Plan with a component related to ASIs. It might also contain the so-called urban policies (e.g. in the area of education, social integration, social housing or mobility).

VI. FINANCIAL FRAMEWORK AND SOURCES OF FUNDING

1. Pre-identified external sources of funding

The projects implemented under the Strategy will be funded from many sources, which are often independent and provided at different times and on different terms. Their catalogue and the range of opportunities will change over time dynamically. In this situation, the key success factor will be the effective coordination of activities related to the acquisition of funds and the efficient execution of multiple (often parallel) interrelated projects, both investment projects (hard) and those focused on human and social capital (soft).

The crucial sources of funding for the Strategy will be instruments operating under various EU policies. The EU's Cohesion Policy and the *Recovery and Resilience Facility* under the Europe's Recovery Plan will play a key role here.

The so-called ***The Partnership Agreement for the implementation of the Cohesion Policy 2021-2027 in Poland*** prepared by the government defines the strategic directions for using the European Regional Development Fund (ERDF), the European Social Fund Plus (ESF+), the Cohesion Fund (CF), the Just Transition Fund (JTF) and the European Maritime, Fisheries and Aquaculture Fund (EFMRA) in 2021-2027 .

It should be assumed that during the Strategy implementation it will be possible to use the ERDF, ESF+, FS and EFMRA as subsidies and repayable instruments. They will be available to Sopot mainly under the following programmes⁸⁵:

- 1) *European Funds for Pomerania (FEP)* with allocation of EUR 1,254 million (EFRR) and EUR 420 million (ESF+);
- 2) *European Funds for Infrastructure, Climate and Environment (FENIKS)* with allocation of EUR 12,820 million (EFRR) and EUR 12.266 million (FS);
- 3) *European Funds for Modern Economy (FENG)* with allocation of EUR 7,973 million (EFRR);
- 4) *European Funds for Digital Development (FERC)* with allocation of EUR 1,988 million (EFRR);
- 5) *European Funds for Social Development (FERS)* with allocation of EUR 4,049 million (EFS+);
- 6) successor to the *Fish Operational Programme* with an allocation of EUR 512 million (EFMRA);
- 7) *INTERREG* programmes (mainly *South Baltic; Poland-Russia; Baltic Sea Region; Central Europe* and *Interreg EUROPA; URBACT IV*).

The potential external sources of funding for the Strategy include the ***National Recovery Plan*** (NRP) prepared by the government on the basis of the Europe's Recovery Plan announced in May 2020.

⁸⁵ The amounts come from the draft *Partnership Agreement* of November 2021 and refer to entire programmes.

Thanks to the *Recovery and Resilience Facility* contained in that plan, Poland can benefit from a total of EUR 58.1 billion, in particular subsidies of approx. EUR 23.9 billion⁸⁶.

In addition to the said sources and instruments, the potential sources of Strategy funding can be an entire range of government⁸⁷ and regional programmes as well as Sopot's own resources (see point 2 below) – not only those used as own contribution to projects supported by external funds.

Attention should also be paid to opportunities created by private funds at the disposal of financial institutions (e.g. loans) and other institutional investors (e.g. interested in participation in PPP-type projects) who may join the implementation of activities in line with the strategic goals of Sopot.

The table below is an initial attempt to assign possible sources of external financial support to individual operational goals within the Strategy⁸⁸.

Table 7. Potential sources of external financial support in the Strategy implementation.

Operational goal	Sources ⁸⁹
1.1. Climate neutrality	FEnIKS, FEP, FENG, NRP, government programmes, private funds
1.2. Biodiversity	NRP, FEP, FEnIKS, EFMRA, government programmes
1.3. Ecological safety	FEnIKS, FEP, NRP, government programmes, private funds
2.1. Health resort	NRP, FEP, government programmes, private funds
2.2. New potential	FEP, FEnIKS, FENG, EFMRA, NRP, government programmes
2.3. External sources of success	FEnIKS, FEP, INTERREG, EFMRA, NRP, government programmes
3.1. Standard of public services	FEP, FERS, FERC, government programmes
3.2. Stable population	government programmes, private funds, FEP, FEnIKS, FERS
3.3. Social competence	FEP, FERS, government programmes

Source: own study.

⁸⁶ The amounts come from the *NRP* draft of 30 April 2021.

⁸⁷ For example: *Governmental Fund for Local Investments*, *Government Fund for the Development of Local Government Roads*, *Strategic Investments Programme*.

⁸⁸ This table is for reference (and overview) only and is for information purposes. Its obsolescence or incompleteness does not imply that the Strategy should be modified.

⁸⁹ The source of funding abbreviations used in the table are explained on the previous page.

2. City's own resources and financial framework for strategic projects

The city's own funds will be an important source of funding for projects that are in line with the Strategy implementation. How many of them can be focused directly on the implementation of the Strategy depends on the ability to generate own revenue, the relationship between revenue and current expenses, and on the scale of debt and the ability to incur further liabilities.

More detailed information in this respect can be found in Table 8 and Table 9.

Table 8. Selected financial indicators for Sopot in (2010)2015 – 2020 [PLN million].

indicator	2010	2015	2016	2017	2018	2019	2020	2020/2015 dynamics
total revenue	331.7	297.2	299.5	295.0	329.3	380.0	378.4	127.3%
current revenue	271.8	228.8	251.7	266.0	276.9	313.5	305.3	133.4%
own revenue	247.8	219.3	211.9	222.0	247.2	280.7	251.7	114.8%
total expenses	399.0	271.7	272.8	281.6	326.0	355.4	372.0	136.9%
current expenses	190.0	210.4	223.8	235.3	253.4	284.5	305.1	145.0%
capital expenses	209.0	61.3	49.0	46.3	72.6	70.9	66.9	109.0%
net operating surplus	73.9	2.3	11.7	14.5	7.3	12.8	0.2	9.6%
debt amount	92.4	99.9	118.9	91.0	97.1	94.7	83.6	83.7%
total debt / revenue	27.9%	33.6%	39.7%	30.9%	29.5%	24.9%	22.1%	-11.5 pp.

Source: own study based on data from the Association of Polish Cities (MRL).

In 2015-2020, the city's own revenue grew slower than total revenue, slower than total expenses and (in particular) slower than current expenses. Under these circumstances, the average annual capital expenses were approx. PLN 60 million. At the same time, the net operating surplus⁹⁰, which is a measure of the investment opportunities in gmina, fell to almost zero in 2020 compared to the average of approx. PLN 8 million for 2015-2020.

In addition, at the end of 2020, the liabilities of Sopot were almost PLN 84 million, meaning approx. 22% of total revenue. This level should be considered safe and sufficient to relatively easy incur further liabilities, particularly for the implementation of the Strategy's goals.

Table 9. Projected net operating surplus for Sopot in 2022-2030 [PLN million].

	2022	2023	2024	2025	2026	2027	2028	2029	2030
net operating surplus	-31.3	0.3	33.3	60.6	69.3	65.2	60.8	56.4	51.7

Source: own study based on data obtained from the SCH.

⁹⁰ The difference between current revenue and current expenses less debt repayment amounts.

Assuming the horizon of 2030 and considering:

- a) Sopot's ability to incur (repay and service) new debt, estimated at approx. PLN 150 million⁹¹;
- b) cumulative net operating surplus estimated at approx. PLN 366 million⁹², which can support the implementation of new projects;
- c) assumption that the share of liabilities in total revenue in each financial year will not exceed 50%;

it is initially assessed that:

- a) Sopot will allocate at least PLN 400 million⁹³ to fund projects that directly contribute to the implementation of the Strategy 's goals, whereas
- b) the external funding obtained (mainly from the EU) will be at least PLN 325 million⁹⁴.

⁹¹ The amount will be estimated according to the data from the financial staff of the SCH.

⁹² The amount requires consultation with the financial staff of the SCH.

⁹³ This amount will be verified before adopting the Strategy.

⁹⁴ As above.

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