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Measures to support the establishment and use of barrier-free spatial information system to help comfortable living of the disabled, elderly, and mobility impaired

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1> The government has led the effort to provide spatial information for the last 20 years. Thanks to the government effort, more citizens are now using spatial information to the extent that the number of people using map services reaches about 40 million per month

2> As the country enters into the ageing society, chances are rising for the elderly aged over 65 to have a certain level of disability along with the people with disability. Therefore, it is expected that there will be a growing demand for map services to help comfortable living of those with poor mobility in the society

3> However, the participation in such mapping and provision of spatial information for those in the vulnerable bracket by the private sector including Naver, KaKao, and other key online service providers is insignificant due to low profitability. Hence, the government needs to provide policy support to maximize the publicness of spatial information

4> To provide map services and spatial information actively to assist comfortable living of the disabled, elderly, and mobility impaired, policy development to enhance the publicness of spatial information is urgently needed and related measures include establishment of standardized and latest spatial information, ensuring interoperability for the provision of barrier-free service, and linking them with related services

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Policy proposals

① Support the establishment a detailed spatial data and information across the country including the information on routes and accessible transportation

- Disclose the barrier-free living environment property information of Ministry of Health and Welfare (MOHW) to the public data portal (data.go.kr, offered by the Ministry of the Interior and Safety (MOIS))
- Provide the location data of living facilities for the vulnerable class through public platforms such as 3D spatial data platform (by the Ministry of Land, Infrastructure and Transport, MOLIT)
- Support the establishment of spatial information based on the participation of the vulnerable class in region and the review of such data, purchase the contents for vulnerable people by the government

② Support the development and spread of specialized technologies tailored to the vulnerable people for better access to spatial information and more convenient living

- Develop specialized techniques and devices supporting the use of spatial information for vulnerable people including autonomous wheelchairs, AR-based navigation technologies, robotic device 'wheelchair view' (mobile phone screen magnifier, guide-cane), etc.

③ Amend laws, regulations, and policies to foster local private parties supporting the establishment and use of barrier-free spatial data and information

- Include provisions specifying the responsibility of supporting the improvement of welfare of those who are vulnerable to access to spatial data to 「National Spatial Data Infrastructure Act」
- Provide the spatial data standards and quality criteria required to connect and integrate the nationwide spatial information for the vulnerable

- Assess the policy implications such as the outcome of creating social values through survey on the status and disparity of spatial data provision to the vulnerable, support the training of the economic players in regions as well as projects to encourage public participation (ex. DSI project based on public participation, public design project)