

## Inclusive Development through Providing Vertical Housing for Low Income Family in Yogyakarta Urban Areas

Rini Rachmawati\*, Charina Vertinia Budiarti, Diana Febrita, Estin Sulistyani

Urban Development Research Group, Department of Development Geography, Faculty of Geography, Universitas Gadjah Mada, Yogyakarta, Indonesia.

\*Corresponding Author (e-mail: rinirachma@ugm.ac.id)

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**Abstract.** Inclusive development is meant to accommodate the marginalised people, most of whom are the poor with the problem of fulfilling their need for housing. The government has tried hard to meet the need of housing by constructing rusunawa. This paper is aimed at describing the provision and uses of rusunawa, both in cities and peri-urban area by studying the cases in the City of Yogyakarta, Sleman Regency, and Bantul Regency. The study was conducted by doing observation and both structured and in-depth interviews. The research results show that rusunawa were viewed as one solution to help a low-income family in fulfilling their need for housing. In some cases in the City of Yogyakarta, rusunawa plays an essential role in preventing the settlement along both sides of rivers from becoming slum areas. Rusunawa in both Regencies of Sleman and Bantul is located near the city, so it is easy for the settlers to get to their workplace. The construction of rusunawa has also paid attention to the disabled by providing exceptional facilities. The same case is providing a playground for children and facilities for early education for young kids. However, there have not been special facilities for the elderly and pregnant women.

**Keywords:** Inclusive development, *rusunawa* (simple flats for rent), vertical housing, low-income family.

**Abstrak.** Pembangunan inklusif dimaksudkan untuk mengakomodasi kepentingan masyarakat yang termarginalkan, diantara adalah masyarakat miskin baik di perkotaan maupun di pinggiran kota dan perdesaan. Kelompok masyarakat miskin memiliki permasalahan, diantaranya adalah pemenuhan kebutuhan perumahan. Pemerintah telah mengupayakan pemenuhan kebutuhan perumahan untuk kelompok masyarakat berpenghasilan rendah dengan penyediaan rumah susun sederhana sewa (*rusunawa*). Paper ini ditujukan untuk memberikan gambaran mengenai penyediaan rusunawa bagi masyarakat kota dan pinggiran kota dengan mengambil kasus penyediaan dan pemanfaatan rusunawa di Kota Yogyakarta, Kabupaten Sleman dan Kabupaten Bantul yang terletak di Propinsi Daerah Istimewa Yogyakarta. Penelitian dilakukan melalui observasi, wawancara terstruktur dan wawancara mendalam. Hasil penelitian menunjukkan bahwa rusunawa dipandang sebagai salah satu solusi untuk mengatasi permasalahan kebutuhan perumahan bagi kelompok berpenghasilan rendah. Dalam kasus di Kota Yogyakarta rusunawa berperan dalam mengatasi potensi kekumuhan di permukiman sepanjang sungai. Sementara untuk Kabupaten Sleman dan Bantul, rusunawa berlokasi di tempat yang aksesnya mudah dengan kota sehingga mendekatkan masyarakat yang tinggal di rusunawa terhadap tempat bekerja. Berkaitan dengan fasilitas, rusunawa telah dirancang dengan memperhatikan kelompok penyandang disabilitas yang diprioritaskan dalam penempatan ruang, demikian juga anak-anak melalui penyediaan ruang bermain dan fasilitas untuk penyelenggaraan Pendidikan Anak Usia Dini. Namun demikian untuk lansia belum ada penempatan khusus terkait dengan ruang demikian juga dengan wanita hamil.

**Kata kunci:** Pembangunan inklusif, *rusunawa*, masyarakat berpenghasilan rendah.

## 1. Introduction

Exclusive development seems cannot fulfil the whole social strata of communities need. It is because through particular approach the benefit only can be reached by part of a group of people. Development should pay attention to marginalised groups because these groups have limited access to development outcomes. Moreover, the development that has been done so far tends to side with the public in general, without taking care of groups of people with specific needs increased the problems of settlements access. Many groups of people become marginalised in development just because of their gender, ethnic groups, age, sexual orientation, physical disabilities, and poverty. Nevertheless, they also have the same right to participate in development (Grills *et al.*, 2016). Therefore, issues of the need for inclusive development today arise.

One of the issues related to inclusive development is about poverty. Poverty as indications that there are problems in social and economic development. According to International Disability and Development Consortium (IDDC), inclusive development is a process to ascertain that all marginalised groups can be involved in the development process (IDDC, 2009). In addition to being able to reduce the poverty rate, inclusive development can be realized when all parties contribute to creating equal opportunities and sharing the benefits of development. Groups of people who are considered the poor are often identical to their limitation in fulfilling their living needs, like lack of a place for living. According to UN-Habitat, a proper place to live in takes the buying cost not more than 30% of income. However, this is not yet fulfilled. As a result, illegal settlement and slum areas keep growing in cities (Huchzermeyer and Misselwitz, 2016). Housing development has become one of the strategies to improve the slum communities (Amado *et al.*, 2017).

Inclusive development is a guide that emphasises the social and ecological aspects of sustainable development (Gupta and Bavinck, 2017). The key of inclusive development is that the benefits of development will only be

equitably shared with the most marginalised in society, ensures that there is an apparent redistribution of power in society in favour of the poor and changes the power relations between actors (Gupta and Bavinck, 2017). In inclusive development considering the groups of marginalised people particularly those belonging to five groups of people, i.e. children, women, the elderly, the poor and the disabled (Rachmawati, 2017). Infrastructure and basic urban services need to be built and improved by also considering the inclusive groups of people (Rachmawati, 2017). Furthermore, Warsilah (2015) convey that inclusive development is a program that wants to develop transparency, invite people to come in and share people with different backgrounds, characteristics, abilities, status, conditions, ethnicity, culture and others in a development process. It is aimed at improving the quality of life, prosperity, and democracy for all Indonesians. In this case, the government should be proactive rather than reactive in addressing urban issues such as slum areas, congestion, and environmental issues especially those related to the poor, needy groups, children, and others (Belsky, 2012). Rachmawati (2017) added that to realise the success of the inclusive development, it takes commitment, coordination, and accessibility.

Inclusive Cities is one of the Sustainable Development Goals (SDGs) implicitly written in point 11, Sustainable Cities and Communities. The provision of cheap, affordable, and inclusive infrastructure that is accessible to all, including children, the elderly, and the disabled becomes the target of Sustainable Development by 2030. One of the targets of this point that, related to housing providing is, ensure access for all to adequate, safe and affordable housing and essential services, and upgrade slum by 2030. City and housing development should be inclusive, safe, and sustainable. Some indicators related to this target are; Percentage of urban dwellers living in slums; The size of urban slums; Lack of dwelling (backlog) based on residents' perspective; Number of new decent occupancy (rent/property); The number of facilities for the provision of housing infrastructure, facilities, and utilities support

disaster management; Household income with housing costs is higher than 30% of revenues. Thus it can be said that housing construction for the poor is inclusive development. It is in line with the targets to be achieved in SDG no 11 related to housing provision and planning. The success of this housing development will be realized through the achievement of the indicators mentioned above. Furthermore, UN-Habitat (2014) supports the inclusive and sustainable urban development through UN-Habitat Global Strategy, a global collaborative movement towards adequate housing for all and improving access to housing in general and the living conditions of slum dwellers in particular. The movement aims to assist states in working towards the realization of the right to adequate housing through the development of national housing strategies based on the principles of inclusive and sustainable cities so that marginalised communities (the urban poor, the elderly and the minority) can meet housing needs.

The Inclusive City is a paradigm to provide positive social impacts to public buildings, green spaces, streets and neighbourhoods (Goltsman and Lacofano, 2007). It indicates that cities can be inclusive for all ages, all abilities, and all income levels (Goltsman and Lacofano, 2007). The character of the inclusive city has required the involvement of all parties (Alessandria, 2016). The actors involved in the process are numerous i.e. the territorial government authorities of various levels (local, regional, national), building and planning commissions, city planners, planners, architects, engineers, private and public employers, law enforcement, businesses insurance, distributing companies of public facilities, educational institutions and training in general, the local population, representatives of immigrants (eg. a delegate of the council of immigrants) (Alessandria, 2016). Each of this can and should play a particular role in the construction process of social inclusion (Alessandria, 2016).

One of the government's efforts in achieving the target and solving the problem of lack of access to settlements for the poor in Indonesia is through the provision of a

simple apartment for rent or called *rusunawa*. *Rusunawa* development is carried out by taking into account vulnerable people, one of whom is a poor person, in this case, called low-income society abbreviated as MBR. *Rusunawa* is one example of inclusive development. An inclusive housing program is a new approach to housing that uses the current local potential and features to provide a sustainable (Amado *et al.*, 2017). Amado *et al.* (2017) convey that the inclusive housing program considers three levels. The first refers to the policies that influence and determine decisions and actions. The second level refers to the guidelines for sustainable settlement and housing development. The third level occurs at the building level at which the criteria and parameters for housing design and their outcomes are considered.

Some *rusunawa* have been built in Yogyakarta Urban Areas that are in the City of Yogyakarta and some sub-districts in Bantul and Sleman Regency. In connection with the provision of *rusunawa* and inclusive development in Yogyakarta Urban Areas, it is crucial to examine whether the existence and location of the *rusunawa* are by the needs. In Yogyakarta City there are 3,304 houses unfit for habitation (Mayor's Decree Number 393 of 2014 on the determination of unfit area in Bappeda Kota Yogyakarta (2015). The result of data collection of slum dwellings and uninhabitable houses (RTLH) in 2015 conducted by the Government of Yogyakarta, slum areas are covering 264.90 hectares and the number of RTLH of 3194 units. (Bappeda Kota Yogyakarta, 2015). The city of Yogyakarta has adopted the inclusive development model as mentioned in the vision and mission of the Regional Medium-Term Development Plan (RPJMD) of 2012-2016 (Bappeda Kota Yogyakarta, 2012). In this document, it is clear that inclusive development is evident in several areas such as housing and public housing.

This paper focuses on the discussion on public housing and settlement areas. Discussion on public housing provision is essential in inclusive development. This is because the problem of housing provision in urban areas is an important issue that needs to be addressed.

Limited land and high land prices cause people, especially those with low incomes, have difficulty in having a house. Thus, it will be very potential for the occurrence of slum area, if there is no solution related to public housing provision. Besides, it is necessary to examine whether the existing *rusunawa* has been utilized by low-income family (MBR) or not. Also, whether the utilisation has been directed to other inclusive groups such as disabled, children, elderly and women. Furthermore, these questions will be the focus of this study. In this paper, in addition to explaining the allocation for the poor, it will also discuss the provision of *rusunawa* and its use for the disabled, elderly, children and women.

## 2. Research Method

### 2.1. Study area

This study was implemented in the Yogyakarta Special Province, especially the City of Yogyakarta, and urban fringe area that is consist of some sub-district that located in Sleman and Bantul Regency, where *rusunawa* are found. There were ten *rusunawa* concentrated in Yogyakarta Urban Areas, 3 (three) *rusunawa* located in the city of Yogyakarta, 3 (three) *rusunawa* in the suburbs located in Bantul Regency and 4 (four) *rusunawa* in the suburbs located in Sleman Regency. The location and distribution of *rusunawa* in particular areas of Yogyakarta as shown in Figure 1. Next will be described *rusunawa* in the three areas of study.

### 2.2. Data collection

There were two steps of study to take the data. The first step was done in the City of Yogyakarta. The second was in the urban fringe area in Sleman and Bantul Regency. The data were collected by observing the areas and their surroundings where *rusunawa* are located. Also, in-depth interview with the policymakers in the study locations was also made as the input to analyse the development and policy. They include Agency for Settlement and Regional Infrastructure, Regional Development Planning Board and Agency for Social Welfare. For the case of a peri-urban area in Sleman and Bantul Regency, the primary data is based

on the structured interview, with 265 and 181 *rusunawa* settlers respectively for both locations. In comparison, for the case in Yogyakarta city did not base on the structured interview, but only based on an in-depth interview with the settlers of *rusunawa*. The difference on the method of primary data collection was because the study was conducted in a different year, i.e., 2014 and 2015. The first step was held in Yogyakarta City, and for the second step was held in both Sleman Regency and Bantul Regency. The method used in the second step of this research was the improvement from the previous study.

### 2.3. Analysis

In this research, the analysis used is descriptive qualitative. The analysis is based on data of in-depth interview with institutions related to *rusunawa* development. Besides, the analysis is also based on an in-depth interview with a technical officer of management of *rusunawa*. Data taken through structured interviews are also part of the analysis in this paper. In this case to prove the appropriateness of the utilisation of *rusunawa* with the existing requirements. The data are also used to illustrate the reasons for the utilisation of *rusunawa* and future development suggestions.

## 3. Results and Discussion

### 3.1. Rusunawa for inclusive urban development

The City of Yogyakarta is the densely-populated area. In this city, spaces for developing settlement are insufficient. There are three rivers crossing the city, namely Code, Gadjah Wong, and Winongo Rivers. Inevitably, spaces along the river bank are potentially becoming slum areas. Therefore, the government of the City of Yogyakarta makes a policy to build *rusunawa* to manage those spaces so that the possibility of them to be a slum area can be minimized. Also, building *rusunawa* is also meant to be one of the solutions in providing proper housing for groups of people with low ability to have a house of their own.



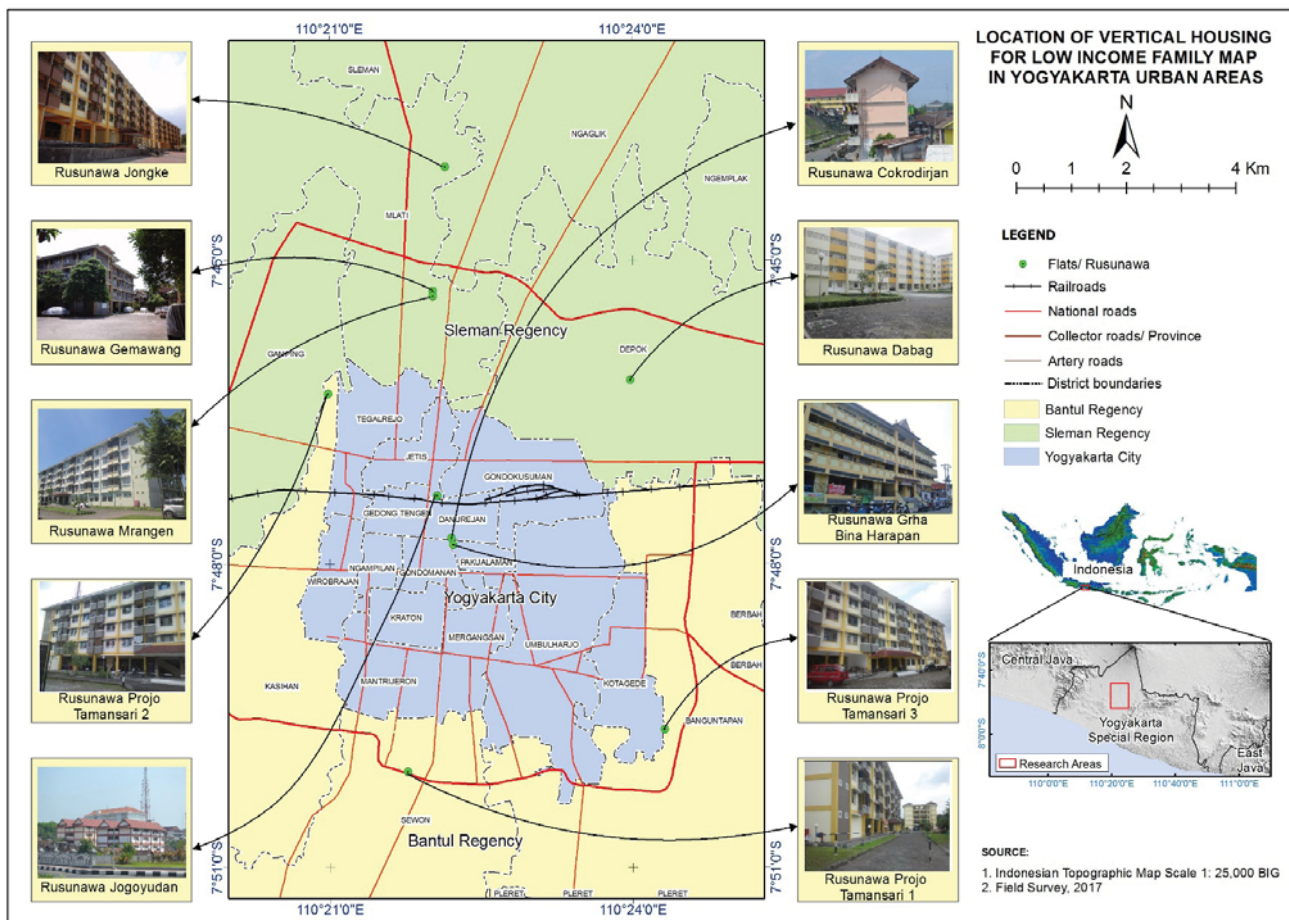


Figure 1. Location and Distribution of Rusunawa in Yogyakarta Special Province.

There are three *rusunawa* in the City of Yogyakarta. They are Cokrodirjan and Graha Bina Harapan Rusunawa that located in the Danurejan Sub District, and Jogoyudan Rusunawa located in Jetis Sub District. Those three *rusunawa* are closely located to one another, less than 1 km, and also close to Code River and downtown area. Based on the side of *rusunawa* settlers, most of them are native people from the area where the *rusunawa* was built. The original *rusunawa* settlers were previously the ones who occupied slum areas. By building *rusunawa*, the government can keep the previously dirty areas clean and well arranged. All the occupancy rate in three *rusunawa* are 100% because of the high need for settlement in Yogyakarta city.

Based on the Mayor’s Regulation of the city of Yogyakarta Number 44 the year 2009 on the Management of Rusunawa belonging to the city government of Yogyakarta, there are several requirements to live in *rusunawa*. The requirements are that the would-be settlers

must be living in the city of Yogyakarta, have permanent jobs, have low family income not more than 1-2 times of Regional Minimum Wage (UMP) in Yogyakarta City, be married with five family members at the most, and not have a house of their own. The regulation furthermore says that the length of living in *rusunawa* is up to 3 years and it can be extended once for another three years. Thus a family can live in *rusunawa* for six years at the longest. However, what is happening is that most settlers live in *rusunawa* longer than six years and they are not ready to move out. It is because they are not so self-reliant, cannot afford a house or even rent one, feel comfortable with low *rusunawa* rent, and live in a place with strategic location and pleasant environment.

The development of *rusunawa* in the City of Yogyakarta as a solution to tackle poverty has not sufficiently shown the expected results. Rusunawa settlers that mostly belong to the marginalised groups of people should be helped to make them free from poverty by

providing *rusunawa*. The result has not been in line with what is expected. In the case of the city of Yogyakarta, for example, facilities for the disabled like lanes for wheelchair or the blind have not been fully equipped in *rusunawa*. Narrow roads or roads close to main city roads are surely dangerous for children and the elderly. It is because *rusunawa* in Yogyakarta city occupies an insufficient land, located in flood-prone areas that is the edge of the river and is the centre of the city, so it is in a dense residential area, so it is not easy to provide facilities for disabled groups, children and elderly. All the occupancy rate in three *rusunawa* are 100% because of the high need for settlement in this area.

Another study of *rusunawa* that will be explained for the next is *rusunawa* in the peri-urban area that located in Sleman Regency. In this location, there are 4 (four) *rusunawa* that distributed in the 2 (two) sub-districts, i.e. Mlati and Depok. The existence of *rusunawa* is expected to be able to fulfil the need for a proper and affordable place to live in, particularly for people with low income. Also, in developing *rusunawa* is expected to accommodate the interest of marginalised people, like the elderly, the disabled, and children.

In the Sleman Regency, the first *rusunawa* was built in 2005. It is Gemawang Rusunawa, located in Mlati Sub District. Because of the earthquake disaster in 2006, some parts of the *rusunawa* building were damaged. It took one year to renovate the *rusunawa*. Meanwhile, it was in 2008 that the Gemawang *rusunawa* was managed again to open. Rusunawa in the Regency of Sleman was built on a piece of land belonging to the village property with the land status for 20-years rent. They were built in cooperation with the ministries of Public Works and Public Housing. The fund was taken from the National Budget. Now there are four *rusunawa* located in the Sub Districts of Depok and Mlati. They are Gemawang, Dabag, Mranggen, and Jongke *rusunawa*. All those *rusunawa* are managed in an office at the Dabag *rusunawa*, located in Depok Sub District.

Rusunawa Gemawang that located in Mlati Sub District, Sleman Regency was built in 2005

with 15,000 sqm area. It has 192 units in capacity with 100% occupancy of 192 households. In 2010, another *rusunawa* was built in the same area named Rusunawa Mranggen with 15,000 sqm area. It has 99 units in capacity with 100% occupancy of 99 households. Rusunawa Dabag located in Depok Sub-district, Sleman Regency with 27,000 sqm area. It was built in 2009. It has 372 units in capacity with 100% of which are occupied by 372 households. The last *rusunawa* named Rusunawa Jongke that located Mlati Sub-district, Sleman Regency was built in 2011 with 25,000 sqm area. It has 396 units in capacity with 89.6% of which are occupied, 355 households. There is some difference on the occupation of the unit within *rusunawa* in Sleman Regency. Now the occupancy rate is higher because the unit is all finished. Back then units that are not ready to be occupied because there is no clean water access provided.

All *rusunawa* in Sleman Regency has the same requirement based on the local government law, one of the requirement is the income of the occupants, which is below three times of Regional Minimum Wage (UMR) in Seman Regency. Also, they must be married. About their marital status, they must show their marriage certificate or a letter of divorce. It is meant to fulfil the need for places to live in for the people of the Regency of Sleman. However, comers can live in *rusunawa* as long as they are not more than 15% of total *rusunawa* units available. The people living in Sleman's *rusunawa* can make use of their place for commercial purposes, but it is only on the first floor. Some units on the first floor are specially provided for the disabled and the elderly. The government has also built special lanes for them. Some facilities are also available for children in *rusunawa*, like a playground, sports hall, and TPA (Taman Pendidikan Al-Qur'an).

The last study area is Bantul Regency. There are 3 (three) *rusunawa*, namely Projotamansari 1, Projotamansari 2, and Projotamansari 3. The *rusunawa* are located in the urban agglomeration centre; it is easy for the *rusunawa* settlers to get to city facilities as well as to reach their workplace in the city. The *rusunawa* distributed into three

part of urban fringe area i.e. in the west part, east and south. Each *rusunawa* is located in the different sub-district. They are Rusunawa Projo Tamansari 1 in the Sewon Subdistrict, Rusunawa Projo Tamansari 2 in the Kasihan Subdistrict, Rusunawa Projo Tamansari 3 in the Banguntapan Subdistrict. There are 186 units in Rusunawa Projo Tamansari 1, 98 units in Rusunawa Projo Tamansari 2, and 186 units at Rusunawa Projo Tamansari 3. Total Rusunawa in the three locations in Bantul Regency is 470 units.

Rusunawa Projotamansari 1 has an area of 11,000 sqm with 196 unit of rooms. Their rate of occupancy is 89.3% because only 175 families stay in Projotamansari 1. Rusunawa Projotamansari 2 has an area of 5,400 sqm with 98 unit of rooms and 85.7% occupancy. Rusunawa Projotamansari 3 has an area of 9,100 sqm with 196 unit of rooms and 40.3% occupancy. The rate of occupancy in Projotamansari 3 is the lowest because from 196 units only 79 families stay there. The achievement of units that have been used in Projotamansari 3 is still low because one building has not been unveiled at the time of the 2015 survey.

The government of Bantul Regency has tried hard to implement inclusive development by building *rusunawa* as an alternative solution to the problem of fulfilling housing and settlement. The local government built these *rusunawa* in cooperation with the ministries of Public Works and Public Housing. Rusunawa in the Regency of Bantul were built on pieces of land belonging to the village property. This *rusunawa* mainly intended for low-income people and a married couple. Low income here means that it must be lower than three times of the regional minimum wage. Meanwhile, for marital status, marital certificate or a letter stating divorce must be attached. It is the primary purpose of fulfilling housing for the native people of Bantul, especially those with low income and those regarded as the disabled. They must have a letter of recommendation from the Social Agency. However, people from outside Bantul Regency are allowed to live in *rusunawa* as long as the number of them may not higher than 10% of the total *rusunawa* units.

Those living in *rusunawa* may not make use of their place for other purposes, only for living in. It is in line with one of the requirements for living in *rusunawa*. So, commercial activities are not allowed. They are allowed only in the space that has been provided for those purposes. Same with the previous region, one of the requirements of the occupant has to have income below the Regency Minimum Wage (UMR) in Bantul Regency.

The Bantul local government has built supporting facilities in the *rusunawa* to implement inclusive development, so that the settlers will find it easy to do their daily activities and will also feel comfortable to live in *rusunawa*. In the yard of the *rusunawa* building is found an open green space. Other facilities available are a playground, *mushola* (small mosque), public bathroom, parking space, meeting hall, and security guard station. All the *rusunawa* settlers can make use of those facilities.

The existence of open green space that is equipped with facilities for children can be an added value for *rusunawa*. The government tries to keep giving priority to children for their needs so that they can grow well in the *rusunawa's* environment that is socially different from other places to live in general. Because there are facilities for children, they can play around and interact with one another. Therefore, parents have to play an active role in keeping an eye on their children playing and that they are also able to get along well with other *rusunawa* settlers. It is expected that, as what the government is expecting, those facilities will enable children to move around freely in getting along with and adapting themselves to other children living in the same *rusunawa* so that they can live comfortably in *rusunawa*.

Related to inclusive development that is aimed at improving openness, need to involve all people with different background, characteristics, ability, status, condition, ethnic groups, and culture in development (Warsilah, 2015). The existence of those facilities is meant to improve the quality of life, social welfare, and democracy for all *rusunawa* settlers in the Regency of Bantul.



Table 1. Characteristics of Rusunawa.

No	Rusunawa	Area (sqm)	Capacity	% Occupancy	Number of families	Income/Economic Class of Occupants (Base on Regulation)
<b>A. Yogyakarta City</b>						
1.	Cokrodirjan	*	72	100	72	Income range from 1-2 of Regional Minimum Wage (UMR)
2.	Grha Bina Harapan	*	68	100	68	
3.	Jogoyudan	*	192	100	192	
<b>B. (Peri-Urban, Sleman Regency)</b>						
1.	Gemawang	15,000	192	100	192	Income per month under three times of Regional Minimum Wage (UMR)
2.	Mranggen	15,000	99	100	99	
3.	Dabag	27,000	372	100	372	
4.	Jongke	25,000	396	89.6	355	
<b>C. (Peri-Urban, Bantul Regency)</b>						
1	Projotamansari 1	11,000	196	89.3	175	Income per month bellow Regional Minimum Wage (UMR)
2	Projotamansari 2	5,400	98	85.7	84	
3	Projotamansari 3	9,100	196	40.3	79	

Source: Indepth Interview & Secondary Data in Rachmawati (2014) & Rachmawati (2015), Local Government, Rusunawa Bantul (2017), Rusunawa Sleman (2017). Remark: \*) Data not available/No Data

Furthermore, the data of the *rusunawa* can be seen in Table 1. Table 1 shows the summary of a characteristic of *rusunawa* that are included size, capacity, occupancy, number of families as well as income/economic class of occupants. In this case, economic class of occupants is based on regulation. The occupants have to have income below the Regency Minimum Wage (UMR) in Bantul as one of the requirement. *Rusunawa* Projotamansari 1 has an area of 11,000 sqm with 196 unit of rooms. Their rate of occupancy is 89.3% because only 175 families stay in Projotamansari I. *Rusunawa* Projotamansari 2 has an area of 5,400 sqm with 98 unit of rooms and 85.7% occupancy. For the occupancy rate of 89.3 percent and 85.7 percent is due to several units of rooms damaged and require repair and maintenance. *Rusunawa* Projotamansari 3 has an area of 9,100 sqm with 196 unit of rooms and 40.3% occupancy. The rate of occupancy in Projotamansari 3 is the lowest because from 196 units only 79 families stay there. The achievement of units that have been used in Projotamansari 3 is still low because one building has not been unveiled at the time of the 2015 survey.

### 3.2. Discussion

The aspect of economic growth is the only goal to be achieved in exclusive development that results in the non-distribution of social welfare characterised by high levels of poverty (Gupta and Vegelin, 2016). Poverty is associated with marginalised people in development (Grills *et al.*, 2016). It means that the poor are not accommodated in the development process and lacking in the benefits of development. In the future, this condition is expected to change through 9 (nine) priority agenda of the Indonesian president called *Nawacita*. This program was initiated to show the priority of the path of change towards a politically sovereign Indonesia, as well as independent in the field of economy and personality in culture. The subsidised low-cost housing program is one that is discussed in the fifth program to be achieved in 2019. In connection with the priority of subsidised low-cost housing development, it appears that exclusive development has been shifted towards inclusive development.

The main problem of development of housing for urban residents in Indonesia is lack of land and high land prices in the urban area,



so cumulatively the housing shortage is always increasing year by year. These constraints lead to the growth of housing construction in the area around the city (periurban area) (Ritohardoyo, 2001). The development of housing in periurban areas will potentially change the areas into urban. Reorientation of land use and economic activities will have the consequences of the change in land value (Kurniawan and Prakoso, 2008).

Developing houses and settlement in the suburbs and city centres is one of the solutions to solve the problem, irrespective of the constraints in solving it. The government has to be more proactive rather than reactive in solving city problems, such as slum areas and environmental problems related to the poor, groups with specific needs and children, and the likes (Belsky, 2012). In this part included providing housing for a low-income family with facilities for those groups. From all of the case of Rusunawa in the study have already think about the inclusivity in developing the concept and implementation of vertical housing providing. It can be seen from awareness to the group of low-income family. There is the various result of three location. In the case of *rusunawa* in Yogyakarta City focused on improving slum area around the riverbank but still not included infrastructure for disabled or elderly yet. The complete example of inclusive development in *rusunawa* is at Sleman Regency, which is focused on providing infrastructure for disabled, children, and elderly. Related to facilities, the Government of Sleman Regency has also provided specialised space for parents in some *rusunawa* (Rusunawa Jogke and Dabag) which is placed on the ground floor. Children's playground facilities for children and disabled lines for people with disabilities have also been provided to support inclusive housing. It can be seen from the research result that on the first floor there are *rusunawa* units specially designed for the disabled.

It is one of the policies in *rusunawa* especially for the settlers with specific needs.

Related to facilities, special lanes for disabled is providing in *rusunawa* (Figure 2). The facilities are at least able to fulfil the daily living needs of the settlers who are grouped into the disabled. Thus, such a policy is meant to give ease and spaces for the settlers to move around freely.

There is a playground for children in the green open space (Figure 3). Playground must be designed for children to develop their social and physical abilities. Thus it should have included all facilities for the disabled children (Siu *et al.*, 2016). The new inclusive playground considered disabled children need such as adequate space for a wheelchair and also caretaker needs such as sitting place (Siu *et al.*, 2016). In *rusunawa*, in addition to playground facilities should be provided open space for residents to exercise. Also, open space can be a garden that also needs to be equipped with seating facilities for disabled groups and elderly.

Related to strategy, a housing development in Indonesia has dualism in term of formal and informal aspect. For urban settlement problems, tend to be ended by favouring formal approach (Hamidah *et al.*, 2017). In Oe-Cusse-East Timor the housing strategy was initially implemented through the Regional Plan of Oe-Cusse in June 2016, considers local economic, social, cultural, and environmental, highlighted by the inclusion concepts (Amado *et al.*, 2016). In Indonesia, the housing strategy is also included in the regional plan, but in the detail of strategy is covered by a related institution such as settlement and regional infrastructure. The product plans of these institutions need to be evaluated. It is necessary to evaluate whether the regulation has already well managed or not. The result of structured interviews shows that 89.44% of respondents in *rusunawa* in Sleman Regency have income less or equal to 3 times the value of UMR. Another data show that total of 75.85% of respondents come from Sleman Regency. This condition indicates that the utilisation of *rusunawa* has been by the regulation.



Figure 2. Special Lanes Facilities for Disabled.



Figure 3. Playground Facilities for Children.

A total of 24.15% of the 265 respondents said the reason for choosing rusunawa is because they do not have a fixed house. Meanwhile, 17.36% of respondents said the reason is that they do not have a fixed house and the rent is cheap, 10.57% said the rental fee is cheap. Also, the reason is proximity to the workplace, as well as feel comfortable living in a flat, close to the city, and the complete facilities. 76.92% of respondents stated that there are still many low-income people who need low-cost housing. Another 9.23% say that rusunawa help low-income people who do not have a home. Another reason is the development of rental apartment that is many enthusiasts, helping young families who have not been able to buy a house, rental and rental prices cheaper with the availability of adequate facilities. Also, some residents argue that rusunawa can reduce the need for land for settlements, as a solution to reduce slum houses, as well as the provision of comfortable homes.

Meanwhile, structured interviews at rusunawa located in the peri-urban area

in Bantul Regency showed that 27.1% of respondents had income less than or equal to UMR, while 72.9% more than UMR. In the future, we need to consider the minimum terms of this income. According to the regulation, residents of rusunawa 70% are from residents with ID Chart Bantul regency, while 30% may be occupied by Non-Bantul Regency residents. Some reasons to live in Rusunawa according to the respondent are; they have no home, affordable and cheap rental, close to workplace, high land price, and high rent house fee.

Based on the perception of rusunawa users, 79.56% of respondents stated that it is necessary to build new rusunawa in Bantul Regency. According to them, there are still much low-income families (MBR) who need help from the government regarding meeting the needs of houses. Some suggestions from respondents in rusunawa in Bantul is the improvement of safety and environmental hygiene conditions and regular checking sanitation channels to deal with leakage. Some of the respondents want to rusunawa ownership.

The research results show that sustainable development that is implemented by building rusunawa is one of the alternatives in fulfilling the need for settlement for low-income people. Inclusive development as an approach to the reaction of the development focusing on growth and not paying attention to marginalised groups of people can be improved through the concept of vertical housing development for a low-income family.

#### 4. Conclusions

Based on the findings of this study, it can be described that the development of *rusunawa* can be one of the examples of inclusive development, primarily as the one focusing on the interest of low-income groups of people. About facilities and spaces, the provision of rusunawa has also paid attention to the disabled as one of the *rusunawa's* settlers to whom the priority is given. The same case is facilities for children by providing playground and facilities for early education. However, not all of the Rusunawa have already provided a particular facility for elderly and pregnant mothers. The development of *rusunawa* is also able to help solve the problem of growing dirty areas, mainly in the susceptible areas along the river bank.

Based on the findings of this study, several recommendations can be made: 1) The development of *rusunawa* needs to be implemented in the city area to minimise the problems of slum and limited land, 2) The development of *rusunawa* should be prioritized

to a low-income family. Therefore, there should be a tight mechanism to select would be settlers, 3) There should be entrepreneurship training given to the *rusunawa* settlers so that they can be self-reliant and that they can afford a place to live in of their own.

The results of this study provide a new perspective that vertical housing is as one form of settlement that is beginning to be accepted by the urban community which is shown by high utilisation. In this case, it is a settlement for low-income people. Previous single houses are preferred. In addition to vertical housing development, it is also a trend for urban settlement development to anticipate limited availability of land and affordability of high land prices. On the one hand, the provision of apartments for upper-middle-class society has become a new phenomenon in urban areas, so, on the other hand, the provision of low-income housing for low-income communities has begun to pay attention to its development to achieve balance and sustainability of urban settlements by looking at inclusiveness.

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