New Paradigm of Family Formation: From Coupling to Multinuclear Family

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Abstract: Since industrialization, family evolution has been a continuous process that is reflected in demographic transitionsi.e., FDT (first demographic transition) and SDT (second demographic transition) with significant variations in different countries. This article attempts to trace the factors like-fertility, economy, socio-cultural value and technologyhave dominant influence in family demographic transitionsthat is prominent in delay marriage and parenthood, high divorce, lower remarriage, growing cohabitation with non- marital birth etc. Such changesstimulate the shifting from conventional family to nuclear family to multinuclear form. The principal findings reflect the features of multinuclear family structure-single living, single mother or father household, cohabitation family, LGBT family, are experiencing and growing around the world specially in OECD countries, Latin America and Far Asia. Despite family dynamics, multiform of nuclear family will be increasing near future by the globalization, urbanisation and postmodern force.

Key words: FDT, SDT, Multinuclear, Cohabitation, LGBT, Urbanisation, Postmodern

Introduction

The theory of second demographic transition (SDT) has a multiple family features with large family dissolution, union deformation, postponed of marriage and parenthood with childlessness, single living, pre and post-marital cohabitation, extramarital birth and remarriage with high divorce rate (Lesthaeghe & Van de Kaa, 1986; Van de Kaa, 1987, 1994, 1996; Lesthaeghe, 1995, 2010, 2020; Latten & Mulder, 2014). The interrelationship between SDT events and traditional family deformation and single household formation is coming into account in developed country since 1980s, recently in developing country (Ogden & Hall, 2004; Wallerstein &Smith,1992; Bongaarts, 2001; Sonawat, 2001; Barkat, 1985). Since 1960s, four radical changes i.e., technological, sexual revolution, women, youth movement (Arnett, 2014), drives to individualism, self-actualisation, gender revolution and materialist to post materialist consumption among educated group, stimulate the conventional family values change. Therefore, traditional extended joint, joint and stem family norm are in transition and move to multinuclear form in 20th century i.e., Cohabiting family,

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nuclear/conjugal family, Foster family, Grand parent family, living apart together family, Gay family, Lesbian family, Bisexuals family, Homosexual family, Transgender family, Single family, Single mother family and Single father family without kith and kin relationship are salient features in SDT.

During first demographic transition (FDT), the traditional joint family value shifts in a nuclear form and further nucleated in SDT (Roy, et. al., 2017). The pioneer of SDT remarks that the history of fertility and household transition started since introduction of industrialisation (Lesthaeghe & Van de Kaa, 1986; Van de Kaa, 1987). There is a strong connection between sub-replacement fertility and small family size which stimulates to universalizing nuclear family (Hendrix, 1975; Malinowski, 1930), single family household (Hall, 1986; Kuijsten, 1995), atomic family (Roy, et. al., 2017), further to diversified family pattern revolution. The value orientation of cultural change does transform towards marriage and procreation, abortion, contraceptive, sexuality, sexual orientation, homosexuality, changing gender role (female job involvement), education, religious, consumerism is moved to ideational system (Lesthaeghe, 1983, 1995, 2010; Maslow, 1954; Bekar,1981). Consequently, conventional family institution is becoming weak and develops individual family model.

World family system is going to be diverging which is not similar to the past (Therborn, 2014). We have described here how the fertility changes, economic development, socio-cultural value shift, technological modification influences the geography of family's structural transformation towards multiple nuclear form. During 1990, the westernisation force spreads beyond the Europe to Latin America, Far Asia, South Asia with SDT features (Lesthaeghe, 2020; Esteve et. al., 2012a, 2012b; Raymo et. al., 2015; Atoh et. al., 2004). But there is no clear explanation how various forms of nucleated family come into existence in different region. After the long history of SDT development in the last 25 years, there have been a drastic shifting in demographic behaviour towards family relationship changes. Therefore, there is a need to review and analyse the new trend of family dissolution and formation with association of nucleation process. In this article, an attempt is made to address the forms of family transition from FDT to SDT and show an alternative view, discusses the forces are active behind the nucleation of new family transition and their regional pattern. Thus, among different multinuclear form-single family, LGBT family and cohabitation are more prominent and becoming popular in coming future.

Overview of Changing Family System from FDT (1650-1950) to SDT (1955 and onwards):

In the 21st century, the family system not converging rather diverging throughout the global. The roots of diversified family system depend on societal change and have a long history. In first demographic wave, an initial phase, the family system generally extended or joint or stem family are formed due to organising co-operation, emotional bonding, economic protection to some extent following social

norm, where children production meets the demand of labour supply for better economic opportunity. In pre-industrial period, developed countries follow the similar family norms about joint family value. After the decline fertility during final phase in FDT, the baby boom (1960) and baby bust (1970) (Ariès, 1980; Lesthaeghe, 1995, 2010) and cyclical fertility theory (Easterlin, 1973; Lesthaeghe & Van de Kaa, 1986) diminishing the child preferences which stimulate to small family cohort. Children becomes king due to parental role for child planning by the motivation to saving, earning and for physical space. The hedonism, biological taylorism and womenoriented personality drive to change the family function towards small and happy family (Ariès, 1980). The contraceptive, sexual and gender revolution and adult self-realisation (Lesthaeghe, 2010) decrease the importance of living together as family system. So, the advantage of small cohort is popularised in second demographic transition. As a result, the traditional family systems break down and are separated to nuclear and multinuclear form.

First demographic transition period exhibits the both fertility and mortality high level to low level with planning of small size family that are affected by the industrialisation, urbanisation and modernisation forces. Nevertheless, SDT does not pay attention to the structural family size rather fertility postponement with childlessness is vital by the individualistic norm (Lesthaeghe, 2010; Van de Kaa, 2001). Although, SDT contains 'sustained sub-replacement fertility, a multitude of living arrangements other than marriage, the disconnection between marriage and procreation, and no stationary population' (Lesthaeghe and Surkyn, 2008; Lesthaeghe, 2010). Such features of SDT weak the family organisation and stimulate to develop individualistic various model of family without traditional norms.

The initial stage of family change that is an expanding family phase (table.1), incorporates first two transition period which consider the larger cohort trending to population explosion due to the limited technology, lack of educational realization, high incidence of death, poverty, malnutrition with following Malthusian marriage cycle, reflected in underdeveloped and developing countries. This period is composed of large family size i.e., Joint family, extended joint family and stem joint family. The second phase includes third and fourth period in first transition describe the stationary family phase (see table.1) developed with the decreasing population trend with better healthservices, health care and socio-economic development. In 1960, various factors like industrialisation, law of employment (Easterlin, 1973), law of material demand (Maslow, 1954), law of materialist to post-materialist consumption (Inglehart, 1997), welfare regime and division of work lead to the self-actualisation motivation to single living, nuclear pair (married couple), nuclear family (couple with children), stem nuclear (couple with children also step sister or brother), atomic family (single unmarried or single mother or single father separated after divorce), broken nuclear (widow with child), supplement nuclear (nuclear family with other relative) towards small family. Moreover, such solitary family institutions are disorganised in

Table 1: Key Aspects of Family Transitions

Transition stage	Time period	Demographic behavioural changes	Family trend	Family stage	Country belongs to period
First transition	1650-1750	High birth and high death, agricultural economy, population growth rate low with low illiteracy, malnutrition, poverty with lower economic growth.	Joint family, extended joint family, stem joint family	Expanding family stage	Under developed and developing countries
	1750-1850	Due to developed health service, literacy the population death rate are decreasing and started to population explosion.			East Asia (Bangladesh, Sri Lanka), African some country, Chile, Guatemala.
	1850-1950	The population growth rate decreased with socio-economic development, the phase with gender empowerment.	Nuclear pair, Nuclear family, Stem nuclear family, broken nuclear family, Supplemented nuclear family.	Stationary family stage	India, Sri Lanka, Thailand, Philippines, Egypt, Algerian, Mexico, Brazil, Argentina, Chile, Venezuela.
	After 1950	The zero-population growth stage are going to be developed due to human development, technological modification.			USA, Canada, France, Germany, Britain, Belgium, Denmark, Australia, Hungary, Ukraine, south Korea, China, New Zeeland

Table 1: contd...

Transition stage	Time period	Transition Time period Demographic behavioural changes	Family trend	Family stage	Country belongs to period
Second	Phase I (1955–1970)	Marriage and parenthood age increased with high divorce rate and contraceptive and gender revolution decreased the family formation. Sub replacement fertility are major feature.	Nuclear family, atomic family, multiple living arrangement, pre-	Diverging family stage	Europe as well as the Western world
	Phase II (1970–1985)	Family dissolution are increasing, people are living without family towards pre and post-cohabitation, single living with individualism.	LGBT family, foster family, Living apart together,		Europe as well as the Western world, USA, northern Europe
	Phase III (1985-onward)	Phase III Marriage and remarriage are decrease with 1985-onward) plateau divorce rate, fertility recuperation around age 30 which stimulate to fertility rise with extramarital birth, self-independency, self-actualization, high expressive value.	household.		Europe as well as the Western world, USA, northern Europe, Asian and Latin American countries

various form without any kith and kin relation bonding i.e., atomic family, multiple living arrangement, pre-post cohabitation, LGBT family, foster family, living apart together, single family household towards diverging pattern (table.1). Such multiple form of nuclear families come into existence first with evidence in developed countries and recently growing in some pockets of developing country (Raymo et. al., 2015). Further the changes of diverging family type have been prominent in second transition on going with SDT period, with new demographic behaviour i.e., late marriage and parenthood, high divorce rate, lower remarriage with premarital and extramarital birth.

Connection between SDT and Multinuclear Family Formation

The history of family formation and deformation have a long chronological succession. In pre-industrial period, during first transition there was the existence of joint or extended family system showing in first circle (Fig.1). In second circle (Fig.1) represents the industrial period about altruistic behaviour changes to individualistic that develop the nuclear as well as single family household. The contemporary period includes both industrial and informational economy disorganise the nuclear as well as joint family which are separated into various form of nuclear uniti.e. multinuclear family showing in third circle in Fig.1.

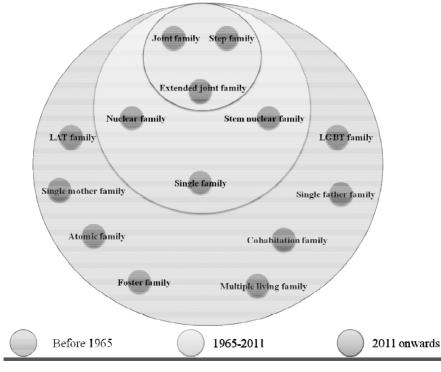


Figure 1: Multinuclear family model

Generally, multinuclear family does develop in some countries with having prominent SDT features. The below replacement condition, better economic opportunity (high GDI, HDI and Urbanisation rate), socio-cultural ideational shift and technological revolution set the platform to enjoy the opportunity to material and non-material needs. Consequently, the life choice is under changing in western country due to westernisation, ethical evolution, family bindings are limited rather individual choice, self-motive starts becoming popular all over the world. As a result, people are not going to involve with the traditional family model rather individual family model becomes popular, where marriage and procreation are the matter of beyond restriction, cohabitation are universal, LGBT right for living is being legalised, in extension division of job, long term carrier opportunity, high divorce rate promote the single living whereas nuclear form of family further is nucleated to different family unit in diverging patterns (Fig.1). Under the circumstances, multiple opportunities make the option open to adopt a choice of multiple family model (Fig.1). Various supporting factors and different conditions of SDT help to form multinuclear family formation, discussed below.

Factors of Changing Multinuclear Family Formation

Changing fertility behaviour/ trends

There is a direct impact of fertility on family dissolution and formation. During, first transition, the fertility moves to be replacement level but not stable due to World War II with the incidence of marriage boom (1950) and baby boom (1960), contraceptive failure (Lesthaeghe, 2010) in industrial countries. After 1960s baby burst fertility takes turn to below replacement level by the ideational shifting i.e., female job participation, increasing marriage age, biological autonomy, mean age of parenthood do increase to some extent in OECD countries. Unfortunately, the patterns of replacement fertility reach not equal, that differs from one regional trend to another i.e. German speaking country in Europe, southern Europe, western Europe have different patterns from new European country (Lesthaeghe, 2020). Early 1970 in far Asia touches such changes of 'lowest low fertility' (Lesthaeghe, 2020), but in Latin America cohabitations are major finding picture rather fertility replacement (Esteve et. al., 2012a). In South East Asia, there have been different pictures due to strong cultural influence but changing rapidly. Therefore, the features of second transition condition (mainly fertility pattern) are not same all over the regions and diversified socio-cultural system, economic development must bear the different trend of the multinuclear family formation one region to another.

Therefore, the demographic transition demonstrates the three fertility patterns like above the replacement fertility, ongoing replacement fertility and below replacement fertility with the dissimilar distinct living arrangement. In the above replacement the population growth is higher and the arrangement is suitable towards joint family system. In ongoing replacement transitional phase, the population

growth increases and individualisation, self-realization, self-actualisation does enrich, consequently the nuclear family system starts to be universal. But, in below replacement phase, growth decreases with the marriage, remarriage events, and many others things happen like increasing divorce, tending to single living, pre-post cohabitation, living apart together, LGBT right to living, etc are the key drivers to single living, single family household towards multinuclear form of new family system. The Europe, Northern America, Australia and New Zealand experience the below replacement with second demographic transition and become familiar with multinuclear family model (Fig.2). Except above mentioned replacement regions rather all region begin experiencing below and ongoing replacement fertility with declining trend (Fig.2) which has been highlighted in first and second stage of family formation (Table.1). But in near future such declining trend of fertility will be the new multiple family formation. As a result the below replacement shows a small family system without kinship relationship.

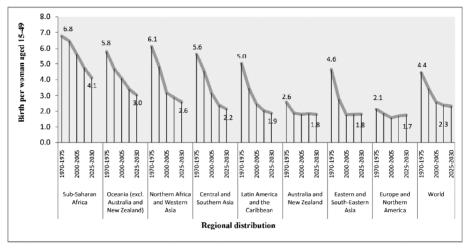


Figure 2: Trend of fertility

Source: UN DESA, 2017

Transformation of Economic Choice

The economy is main driver of demographic behavioural change. Pre-industrial period does not offer much economic choices which would integrate people in collective action with joint family institution. After the industrialisation, economy started going to capitalistic mode, where individual consumption sharply increases and life choices are diverse. Also, human development increases by the welfare state role with better standard of living and around 55.3 % people reside in urban area for wellbeing and better opportunity. It means economic development is positively correlated with GDP, HDI and urbanisation indicator.

	,							
Continent	per cent of urban population in total population*	Region	HDI**	GDI***				
North America	82	Arab States	0.703	0.856				
Latin America and the Caribbean	78	East Asia and the Pacific	0.741	0.962				
Europe	74	Europe and Central Asia	0.779	0.953				
Oceania	68	Latin America and the Caribbean	0.759	0.978				
Asia	49	South Asia	0.642	0.828				
Africa	43	Sub-Saharan Africa	0.541	0.891				
		OECD country	0.895	0.976				

Table 2: HDI, GDI and Urbanisation Rate

The economic output, human development index has changed the individual thinking and shift to post materialist consumption. The table. 2 represents that those countries have high GDI, HDI and urbanisation indicator facing with higher divorce rate, cohabitation, extramarital birth, high age of marriage, low remarriage, high single living which indicate the nuclear family dissolution and new family formation. After the industrialisation, the major demographic behaviour change was found in developed country like U.S.A., Canada, Australia, New Zealand, Europe, Japan as well as OECD countries with positively increasing HDI, GDI (Lesthaeghe, 1995; Van de Kaa. 1994). The innovation of urbanisation has been another driver to cultural change. Urbanisation makes available an unlimited opportunity, resulting the individual choice increases for self-fulfilment and self-satisfaction without cultural restriction by the globalised force. Also urban environment helps new generation for new family formation towards single living, cohabitation, homosexual living without social norms. Asia, Africa have, to some extent, similar trend of urbanisation, HDI, GDI with low economic development social and cultural restriction restrict the family dynamics, but some pockets like Japan, Korea, China, India (Raymo et. al., 2015; Quah, 2003; Sonawat, 2001) are experiencing recently such changes of family type. Variation in perspective of family type of different regions is going to be multiple form of family in near future. In post-industrial period along with information age, the sub replacement condition also stimulates more divergence of family to multinuclear family.

^{*}Source and Year: For urban population source by Statistia, 2020, **For HDI data source is United Nations Development Programme. 2019, ***GDI value source Human Development Report 2019

Social Shifting and Cultural Turns

In the first transition, there was no such better household condition, health facility with low life expectancy, but in final phase of first transition and ongoing second transition, the improved economic and health facility help the evolution of family in new format. The religious, political, social class pillar do not limit the power of individual family making rather division of labour increases the female participation with higher material needs and ethical uplift (Lesthaeghe, 2010, 2020) and propagation to individualistic family model. The ideational change (postmodernist values) has connection with SDT features with transform historical secular value i.e., cohabitation, non-conventional family and non-traditional family attitude. Most of the developed countries are undergoing the increasing marriage age due to participation of women in workforce, educational attainment and job stability, which results in increasing the delay marriage and parenthood that enrich long term single living and stimulate to cohabitation rising. In South Asian and African country, an early marriage is prevalent for low socio-economic status rather East Asian countries recently experience increasing marriage age with cohabitation. Latin American countries, have higher cohabitation rate rather European country, after long cohabitation moves towards final marriage (Esteve et. al., 2012a). Another key element of SDT is high divorce rate with low remarriage. Also, increasing divorce may change the marriage pattern which indicates the increasing single living arrangement, extramarital birth or non-marital birth. Between 1980 to 1990, most of the industrial country experienced high divorce rate (Van de Kaa, 2001) but recent OECD data (Fig.4) showing the marital stability is growing marginally (OECD, 2015),

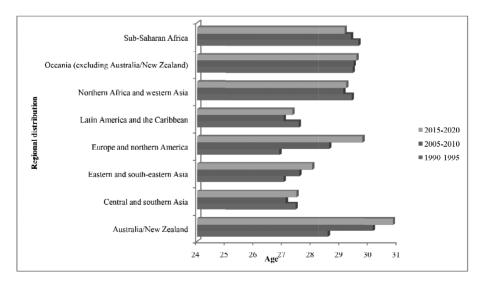


Figure 3: Increasing Marriage rate in different region

Source: United Nations, Population Division, Department of economics and social welfare, 2019 rather East Asian country recently experienced high divorce rate (Raymo et. al., 2015), nevertheless Islamic Southeast Asia and South Asian (Dommaraju & Jones, 2011) as well as African countries follow stable and low rate of divorce that is influenced by diverse socio-cultural norms. Therefore, marriage age is increasing across the region but divorce follows dissimilar pattern owing to different factor like cultural influence, ethnic community, religious force to some extent education attainment. The growing marriage age signifies long standing single living and prone to cohabitation and extramarital birth change the traditional family type and high divorce in developed and East Asian country reducing the formation of joint family rather solo family.

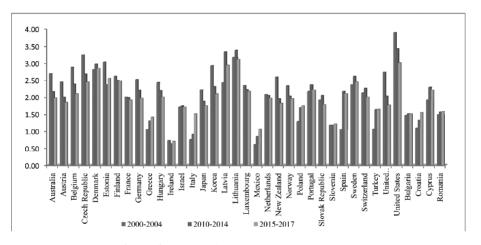


Figure 4: Crude Divorce rates per 1000 people

Source: OECD family database 2017

Impact of Technological Change

In the third civilization wave, technology is the major driver for life choice. In first transition, limited technology restricts the life opportunity and bounds people to follow the traditional norms. After post-industrial period, in SDT phase, there has been a multiple choice for family making without traditional family model. The contraceptive evolution is major technological advancement, drives to fertility decline. Along with this, some others like surrogacy, test tube baby, invitro fertilization, sperm donor directly influence the fertility (Latten & Mulder, 2014), which reduce the partner importance to child bearing. As a result, the family creation interest decreases among new generation and weak the family system which stimulate to multiple new family system purposefully. Anyone in any place can nurture or adopt child without marriage and pregnancy, on the other hand children rearing and caring are initiated without family institution in different parts of the world. Even cohabitation, single family, gay family are popularised with new system of family making. So, the disconnection between marriage and procreation stimulates

to sexual revolution, that is possible for technological support. Therefore, technology is being a major driver to demographic behaviour changes which impacts the fertility as well as family formation directly and indirectly.

Geographical Distribution of Multinuclear Family

Lone Living arrangement

The pattern of single-family households is gradually increasing throughout the world. It is happening in both genders, but such changes get momentum due to women empowerment towards new job, identity exploration, self-independent motivation. The account is showing the lone living or single living are increasing throughout all region. The second demographic transition reflects that single family household increases because the lower fertility, marriage disconnection, high cohabitation and individualism. So, the table.3 showing that most of the regions are experiencing the single living, mainly lone mother is highest in African, next to European region with least child arrangement. In that case the pattern of single living has been changing from western world for 'social contagion' (Zaidi & Morgan, 2017) and in another region due to globalisation, industrialisation and urbanisation force. Therefore, not only replacement fertility but also lone living with single child is the major motivation to non-married birth or extramarital birth. The employment and educational opportunity put off the demographic process towardlate marriage and parenthood. Lone male and female age group are increasing worldwide that is

Table 3: Single Parent Household (in percentage)*

Region	Lone father (all ages)	Lone mother 0-17 and at least one child below 18	Lone mother 18-24 and at least one child below 18	Lone mother 25-34 and at least one child below 18	Lone mother 25-34 and all children 18 and over	Lone mother 35-59 and at least one child below 18	Lone mother 35-59 and all children 18 and over	Lone mother 60 + and at least one child below 18	Lone mother 60 + and all children 18 and over
Sub-Saharan Africa	15.8	0.3	6.1	23.7	0.1	40.1	6.9	1.8	5.2
Central and Southern Asia	15.1	0.0	2.2	19.1	0.1	37.2	18.3	0.7	7.4
Northern Africa and Western Asia*	11.9	0.3	3.9	11.6	0.0	34.1	20.0	1.4	16.8
Latin America and the Caribbean	13.6	0.1	2.6	14.7	0.1	32.8	18.2	0.6	17.2
Europe and Northern America*	16.6	0.0	3.1	15.3	0.0	31.1	17.7	0.2	16.1
World	15.7	0.1	3.3	17.5	0.0	35.5	15.4	0.9	11.6

the motivation to transform traditional family organisation and new living arrangement towards multi systematic nuclear form.

The lone female households are growing cross all region (Table.4). Some regional cultural factors are major restriction to single living as in Central and South Asia due to early marriage and traditional norms, which results in the higher number of extended living in this region (Table.4), but in another region like European, African, Northern American, an extended household are decreasing for the strong nuclear family influence. Therefore, all over the world single family households are increasing that highlights the new form of multinuclear family i.e. atomic family, single father, single mother household (Roy et. al., 2017).

Table 4: Living Arrangement of Single Mother (in %age)*

Region	Lone mothers living alone with children	Lone mothers living in extended households
Europe and Northern America*	68.0	32.0
Northern Africa and Western Asia*	53.6	46.4
Latin America and the Caribbean	55.2	44.8
Sub-Saharan Africa	53.8	46.2
Central and Southern Asia	33.1	66.9
World	50.0	50.0

*Source: UN DESA 2017 and UN Women, 2019

Living with Cohabitation

Cohabitation is the principal feature in second demographic transition. Generally, pre and post cohabitation are found in global scale (Lesthaeghe,2020). The new arrengement of such relationship is not always linked with fertility transition rather cultural and ideational change as well as individualism attitude are responsible for the development of such living arrengement. In fact, cohabitation is increasing all over the world with three point of view as ethnohistorical, pattern of disadvantage (POD) and SDT after 1970 (Lesthaeghe, 2020). Such cohabitation did not emerge from cultural revolution rather long historical roots after 1970, promotes the cohabitation relationship. The elite orientation not only triggers to happen cohabitation rather low economic status, lower employment opportunity and low to medium educational gradientare also going into trial mariage or cohabitation without entering into stable family creation. Even different migration conditions develop the short and long term cohabitation relationship with children in place of origin and place of distination (Lesthaeghe, 2020).

A huge amount of cohabitation has increased in some selected Latin Amarican country (Table.5). After 1990 such countries have undergone change through the second demographic transiton, resulting in changing culture, independent living, self fulfillment, self actualisation and ideational are major motive to cohabitation in Latin America. Both of male and female in certain age group cohabitation increases steadily in Argentina, Brazil followed by Costa Rica and Ecuador (Table.5). Even cohabitation related stigma decreases among educated adults in Latin America (Lesthaeghe & Esteve, 2016). Accordingly, in European country cohabitation rate may grow after industrialisation and continues to increase further period showing in Fig.5. Among the European age group (20-34+) are major section involed with cohabitation and there is a positive connection of education with highest rate of cohabitation in Slovak Republic, Slovania, Italy etc. (Fig.5). But, not all European country have similar trends rather southern and northern countries with less cohabitaion rate due to strong political and cultural force. In North American states, rate of cohabitation is lowest incontrasting with European level caused by strong marriage culture, on the other hand in USA among Black population and those are having middle educational gradient those would prefer cohabitation (Lesthaeghe & Esteve, 2016; Lesthaeghe, 2020). In Canada, highest cohabitation is found in Quebec, the North (mainly Inuït) and the Atlantic provinces rather Ontario, Manitoba, Saskatchewan, Alberta, British Columbia (Laplante & Fostik, 2016; Lesthaeghe, 2020). In Pacific country as in Japan, Philippines, China incidence with growing cohabitation gradually changes after 2000 attributed to industrialisation, urbanisation and modernisation (Lesthaeghe, 2020). In Sub-Saharan Africa, cohabitation is identified among poor people who are migrated for long term that is called as 'poor man union' (Calvès, 2016; Lesthaeghe, 2020). Also in Eastern and Southern Africa, event of cohabitation is fostering single mother families (Moore & Govender, 2013; Lesthaeghe, 2020). This change is happening due to appearing in advance stage of fertility transition among African countries but still prevalent first transition (FDT).

Table 5: Share of Cohabitation in selected country of Latin America (in %age)*

	Age group 25-29						Age group 30-34						
Country	19	70	200	00	201	10	197	70	200	00	201	0	
	M	F	M	F	M	F	M	F	M	F	M	F	
Argentina	13.1	11.1	48.7	41.3	72.2	65.5	10.9	10.1	33.2	28.7	54.6	48.1	
Brazil	7.2	7.6	45.5	39.3	57.3	51.1	6.5	7.1	35.4	31.6	47.3	43.5	
Chile	4.4	4.6	29.3	24.6	_	_	4.2	4.6	20.4	18.3	-	_	
Colombia	20.3	19.7	73	65.6	_	_	18.6	18.2	62.1	56.6	-	_	
Costa Rica	17	16.8	38.1	32.6	56	48.5	15.3	16.1	29.8	26.3	42.4	37.7	
Ecuador	27.2	27	41.5	37.4	52.9	47.4	24.8	25.3	36.4	32.5	44.5	40.1	

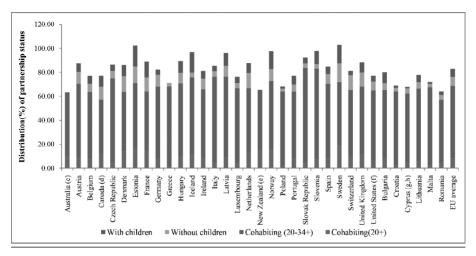


Figure 5: Partnerships and cohabitation status**

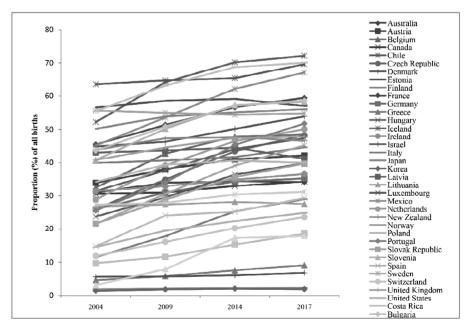


Figure 6: Share of birth outside marriage in European country***

* Source: Esteve, A., Garcia-Roman, J., Lesthaeghe, R., & Lopez-Gay, A. (2013). The "second demographic transition" features in Latin America: the 2010 update. *Unpublished Manuscript*]. *Barcelona: Centre d'EstudisDemogràfics*.

** Source: OECD family database 2011
*** Source: OECD family database 2017

On the other hand, cohabitation with significant number of children are common among Estonia, Iceland, Sweden, Norway etc and cohabitation without children is higher among Sweden, Estonia, Denmark, Netherland etc. (Fig.5) Share of the birth outside marriage or non-marital birth is also a major feature in multinuclear family. In Fig.6 showing extramartal birth outside marriage is common in devloped countrieslike Mexico, Chile, Costa Rica, Italy with higher growth rate. Therefore, SDT aspects of cohabitation, non marital birth decrease the marriage importance other than new family relationship development.

Right to LGBT Family Creation

In post-modern culture, the society with much heterogeneity that gives equal opportunty to all. In second demographic transition gay relationship, same sex marriage, same sex couple are accepted to living as family (Weeks et. al., 1999; Ogden & Hall, 2004, Latten & Mulder, 2014). Queer research reveals that homosexual behavour (LGBT) is natural towards new right of living. N. Jarvis (2015) stated that 'An attitudinal shift and diminish cultural homophobia increase new paradigmof family' which helps to form new individualistic family model. From developed country

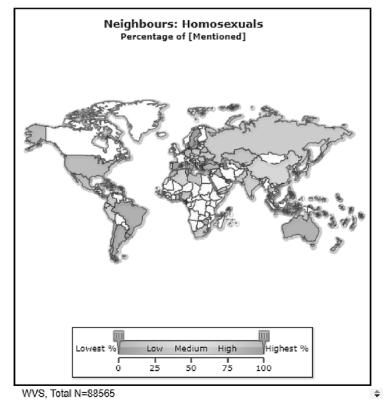


Figure 6: Homosexuality

Source: World value survey wave 6: 2010-2014

like Australia, about 180000 people were surveyed, 6.9 % identified as homosexual, in 2018 Austria about 6.2 %, in France female surveyed in 2016, around 4 % identified as gay or bisexual, in Germany, 2017 female surveyed showing 5 % gay as well as USA, UK around 5 % LGBT community are settled with living right (Wikipedia, 2020). Ten cities in Brazil were surveyed that shows 7.8 % belongs to gay and 2.6 % are in bisexual group, in Asian country like Japan has 5.2 % and in Thailand 4.2 million people are LGBT (Wikipedia, 2020) and India 7.9 lakhs transgender are found with legal right. World value survey (Inglehart, 2014) shows (Fig.6) that all over the world homosexuality is increasing. Interestingly, most of the LGBT communities are settled in urban area due to cultural practice without barrier. Therefore, such LGBT right has undergone a major change at first in western country after long time it spreads in different continent. Moreover, world value survey points out thatin Latin America, cohabitation, homosexuality, divorce and abortion are increasing due to the de-stigmatization by ethical revolution (Lesthaeghe & Esteve, 2016). But in Islamic country as well as South Asian country with strong cultural restriction and unsatisfactory level of female education and employment reduces such incidence. Recently LGBT community in different countries is trying to be involved in movements to establish their right.

Towards New Type of Family

Different single-family type increases worldwide which develops multi nuclear family model due to different family nucleation process. Along with lone family i.e., atomic family, single mother family, single father family, live together family, LGBT family, there also have others type of nuclear family which are emerging for socioeconomic changes. In living apart together family (LAT) comes into viewbecause of division of labour. For different purposes like job or carrier or working purpose, husband and wife are separated and staying a long distance away, naturally they meet each other weekly or monthly or yearly. Such condition stimulates to force growing family without any stable family institution. On the other hand, in globalised world everything is going to be uncertain, so relationship is not stable and multiple relationships are growing with multiple relationship family that are being developed by adopting any child for foster care. Such family called as foster family especially considering female household.

The Google n gram diagram (Fig.7) shows the research about such different family. This diagram helps to identify important words that are used in research purposes. Major the extended family (Fig.7) continues influence from FDT to SDT rather joint family is facing decline trend, nevertheless nuclear family continues through the time (Fig.7). The cohabitation relationship has a long history but after the 2000 new type of family like LGBT, single parent, foster family, are getting significantly attention for further research (Fig.7).

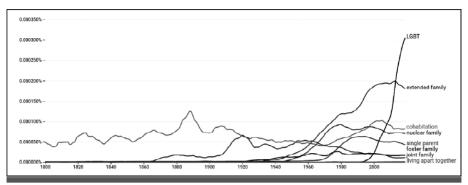


Figure 7: Popular Multinuclear family form based on Google books n gram

Conclusion and Future Expectations

The factors and features pertaining to family formation have been changing from FDT to SDT, even nature of change is different from region to region which is attributed to many demographic, socio-economic, cultural, technological, political and policy related factors. Heterogeneity of family types are being popular with changing the social unit of family. Changing demographic behaviour is playing a vital role for modification of traditional family system and values. Modern communication, impact of globalization, changing norms of family formation, familiar with urban culture and many local factors in different magnitude are affecting the mid-set of adult population. In the previous article related to the changing family formation that is how nuclear family is being more nucleated in atomic form (Roy, et. al., 2017), has been pointed out but here we have tried to indicate again how nucleation process is going to be more divergent into different parts rather making the stable form in atomic family.

In coming near future, different societies will face the situation that are mentioned below that is predicted based on the data analysis-

- a) The sub-replacement fertility will be the common phenomena in developing and under developing country where such multi nuclear process will grow further in near future.
- b) Also, socio-economic development stimulates the increasing age of marriage, divorce rate along with promoting the standard of living but in spite of the unsatisfactory development among different countries in south, such demographic changes are taking place in those country.
- c) Now the Fertility related technological options were limited among economical developed country but recently its universalization makes it popular and available everywhere that changes the sexual pattern and has significant effect on traditional family norm.

- d) The cohabitation, lone family household reveal that it is distributed all over the world although some pockets are the hotspot, but near future it will extend it influence to country with cultural limitation.
- e) LGBT right is changing which in future will be a universal for human right to family making or living together.

Therefore, the FDT is marked by some identified features but SDT features touches with complex demographic behavioural change by the family formation and dissolution with new type of family.

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