

Socio-cultural influences on family planning choice: A study of women in selected community areas of purba bardhaman, West Bengal

Jhunu Sarkar^{1*}, Gaurav Tyagi²

^{1*}PhD Scholar, Department of Nursing, Desh Bhagat University, Mandi Gobindgarh, Punjab, India

²Professor, Faculty of Nursing, Desh Bhagat University, Mandi Gobindgarh, Punjab, India

DOI: 10.5281/zenodo.20279933

Abstract

Reproductive choices among women are significantly influenced by socio-cultural factors that shape attitudes, beliefs, decision-making autonomy, and access to reproductive healthcare services. In India, especially in semi-urban and rural areas such as Purba Bardhaman district of West Bengal, traditional norms, family structures, religious beliefs, educational status, economic dependence, and gender expectations strongly determine women's reproductive behavior. This article explores socio-cultural influences on reproductive choices among women in selected community areas of Purba Bardhaman. The study examines factors affecting family planning decisions, contraceptive use, fertility preferences, and access to reproductive health services. The findings reveal that educational attainment, spousal communication, family pressure, religious beliefs, and economic dependency significantly influence reproductive decision-making. The article highlights the need for culturally sensitive reproductive health interventions, community education, and empowerment-based strategies to enhance women's autonomy.

Keywords: Reproductive Choices, Socio-Cultural Factors, Women's Autonomy, Family Planning, Purba Bardhaman, West Bengal.

Introduction

Reproductive health constitutes one of the most essential dimensions of women's overall health and well-being because it encompasses the complete physical, mental, emotional, and social well-being associated with reproductive processes and reproductive rights, thereby significantly influencing women's quality of life, family health outcomes, and broader social development indicators across communities and nations (World Health Organization et al., 2022). The concept of reproductive health extends beyond the absence of disease or infirmity and includes the ability of women to make informed, voluntary, and autonomous decisions regarding their reproductive lives, fertility preferences, maternal health, family planning choices, and access to quality reproductive healthcare services throughout different stages of life (United Nations Population Fund et al., 2021). Reproductive choices specifically refer to a woman's capacity to decide if and when to marry, whether and when to conceive, how many children to bear, the spacing between pregnancies, and the selection and use of contraceptive methods according to her personal preferences, health needs, and socio-economic circumstances (Singh et al., 2020). These decisions are critical determinants of maternal and child health because they directly influence pregnancy outcomes, birth preparedness, neonatal survival, maternal mortality risks, and the physical and psychological well-being of women and families (Kumar et al., 2019). In developing countries such as India, reproductive choices are deeply embedded within broader social structures, cultural expectations, and family systems that often restrict women's autonomy and decision-making authority, particularly in rural and semi-urban settings where patriarchal norms remain dominant (Patel et al., 2020). Although India has made

notable advancements in reproductive healthcare delivery through initiatives such as the National Health Mission, Janani Suraksha Yojana, and expanded family planning services, socio-cultural barriers continue to impede equitable access to reproductive health services and informed reproductive decision-making among women (Ministry of Health and Family Welfare et al., 2023). Studies have consistently shown that women's reproductive autonomy in India is constrained by gender inequality, educational disparities, financial dependence, early marriage, and traditional expectations surrounding fertility and motherhood, all of which reduce women's ability to exercise independent reproductive choices (Bhatia et al., 2018). In many communities, reproductive decision-making is rarely an individual process and instead involves multiple actors including husbands, mothers-in-law, fathers-in-law, community elders, and religious leaders, whose beliefs and expectations often shape women's reproductive behavior and health-seeking practices (Das et al., 2021). Family structures, especially within joint family systems prevalent in many parts of India, often reinforce patriarchal authority where elder family members dictate decisions related to childbearing, contraception, and desired family size, thereby limiting women's reproductive agency (Chatterjee et al., 2021). The persistence of son preference in several Indian communities further complicates reproductive choices by encouraging repeated pregnancies until a male child is born, thereby increasing reproductive burden and exposing women to heightened health risks associated with multiple pregnancies and reduced birth spacing (Gupta et al., 2022). Cultural beliefs and religious interpretations also influence attitudes toward contraception and family planning, with misconceptions regarding modern contraceptive methods often discouraging women from adopting effective fertility regulation practices (Roy et al., 2019). In rural and semi-urban regions, social stigma associated with contraceptive use and discussions about reproductive health often limits open communication between spouses and healthcare providers, reducing opportunities for informed reproductive counseling and decision-making (Verma et al., 2020). Educational attainment is another critical determinant of reproductive autonomy, as women with higher levels of education are generally more likely to access reproductive health information, communicate effectively with partners, seek professional healthcare support, and make independent decisions regarding family planning (Mukherjee et al., 2023). Conversely, limited literacy and poor health awareness restrict women's understanding of reproductive rights and available healthcare options, thereby perpetuating dependence on family members and traditional norms (Sharma et al., 2018). In West Bengal, reproductive health indicators demonstrate substantial intra-state disparities, with semi-rural districts such as Purba Bardhaman reflecting distinct socio-cultural patterns that influence reproductive decision-making among women (West Bengal Health Department et al., 2024). Purba Bardhaman is characterized by a mixture of agrarian communities, traditional family systems, caste-based social structures, and varying educational levels, all of which interact to shape women's perceptions, preferences, and practices related to fertility and family planning (Sen et al., 2024). Women residing in selected community areas of Purba Bardhaman often face reproductive decisions influenced by social expectations regarding early marriage, childbearing soon after marriage, preference for larger families, and deference to elder family authority in matters of reproduction (Banerjee et al., 2022). Community beliefs surrounding reproductive health frequently intersect with economic dependency and limited mobility, restricting women's access to healthcare facilities and reducing opportunities for confidential reproductive counseling (Saha et al., 2021). Figure 1 conceptually illustrates the multidimensional framework linking socio-cultural determinants such as education, family authority, religion, economic status, and gender norms to reproductive decision-making outcomes among women in selected communities of Purba Bardhaman. Recent findings from the National Family Health Survey-5 highlight significant regional disparities in contraceptive prevalence, unmet need for family planning, and women's participation in reproductive decision-making across Indian states, emphasizing the urgent need for context-specific investigations into local socio-cultural influences (International Institute for Population Sciences et al., 2021). Understanding these socio-cultural determinants within the Purba Bardhaman context is essential for designing culturally responsive reproductive health interventions, strengthening community awareness, promoting women's autonomy, and ensuring equitable access to reproductive healthcare services that support informed and voluntary reproductive choices (United Nations Women et al., 2023).

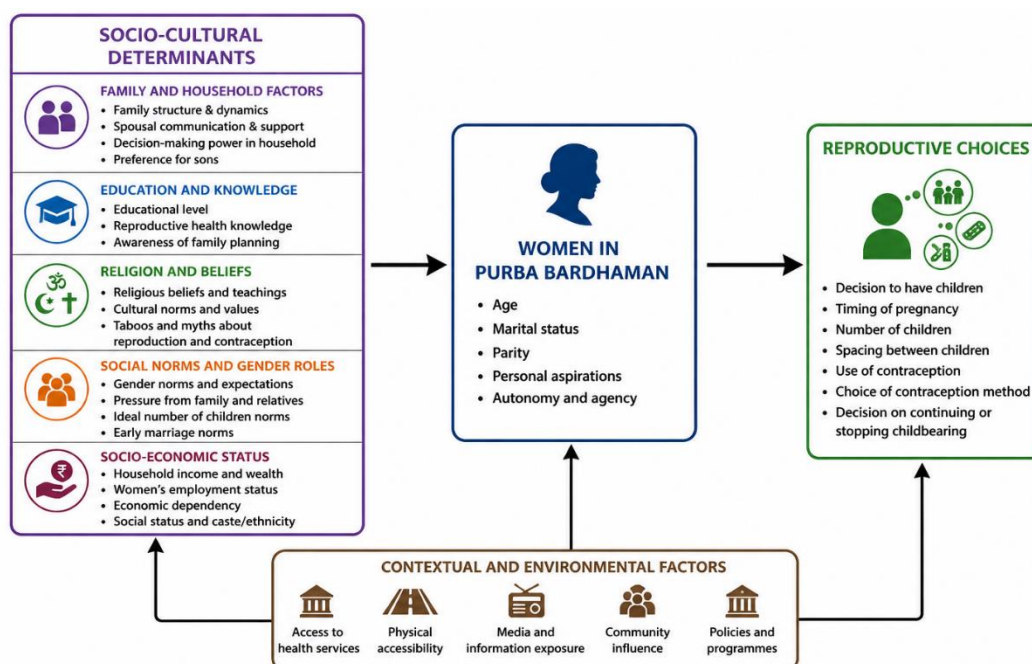


Figure 1. Conceptual framework showing socio-cultural determinants influencing reproductive choices among women in Purba Bardhaman

Background of the Study

Reproductive decision-making among women is a complex process shaped by the interaction of social expectations, cultural beliefs, familial hierarchies, economic realities, and individual awareness, making it one of the most socially regulated dimensions of women's health and autonomy across developing societies (World Health Organization et al., 2021). In many parts of India, reproductive choices are rarely exercised solely by women themselves because decisions regarding fertility, childbearing, spacing of pregnancies, and contraceptive use are often embedded within patriarchal family systems that prioritize collective family expectations over individual reproductive preferences (Patel et al., 2020). Traditional social structures in Indian communities frequently position women as subordinate decision-makers, where reproductive choices are strongly influenced or controlled by husbands, mothers-in-law, and elder family members who determine when a woman should conceive, how many children she should bear, and whether modern contraceptive methods are acceptable within the family context (Chatterjee et al., 2021). Such dynamics are particularly visible in semi-urban and rural settings where patriarchal authority remains deeply institutionalized, and women's voices in reproductive discussions are often minimized due to longstanding gender norms and unequal power relations (Mukherjee et al., 2023). Family elders, especially mothers-in-law, often hold substantial authority over reproductive decisions because they are perceived as custodians of tradition and family lineage, and their influence can significantly affect women's access to contraception, healthcare services, and reproductive counseling (Das et al., 2022). Husbands similarly play a critical role in reproductive decision-making, as male approval is often considered essential before women can access family planning methods or seek reproductive healthcare, thereby limiting independent reproductive agency (Roy et al., 2019). This control over reproductive choices reflects broader gender inequities in Indian society where women's reproductive roles are frequently defined in relation to familial responsibilities and societal expectations rather than personal health needs or aspirations (Sen et al., 2024). Research consistently demonstrates that women's reproductive autonomy is strongly associated with educational attainment, employment status, and access to accurate reproductive health information, with educated and economically independent women more likely to negotiate reproductive decisions and utilize modern contraceptive services effectively (Bhatia et al., 2018). Education enhances critical thinking, awareness of reproductive rights, and confidence in engaging with healthcare providers, thereby enabling women to challenge restrictive norms and make informed decisions regarding fertility and family planning (Singh et al., 2022). Employment similarly contributes to reproductive autonomy by increasing financial independence and reducing dependence

on family members for healthcare access and decision-making support (Verma et al., 2020). Access to health information through community outreach programs, digital media, and healthcare counseling also empowers women by correcting misconceptions and improving understanding of available reproductive choices (Kumar et al., 2021). However, despite these enabling factors, socio-cultural beliefs surrounding ideal family size, son preference, and fertility expectations often override women's personal preferences and constrain reproductive freedom (Gupta et al., 2022). In many Indian communities, cultural expectations emphasize early childbearing after marriage as a marker of fertility and social acceptance, placing pressure on women to conceive quickly regardless of their own readiness or health status (Banerjee et al., 2022). The preference for male offspring remains a particularly significant determinant of reproductive behavior, leading many women to continue childbearing until a son is born, even when they desire fewer children or wish to adopt contraception (Sharma et al., 2018). Such pressures not only increase reproductive burden but also expose women to repeated pregnancies, shorter birth intervals, and associated health risks including maternal depletion and adverse neonatal outcomes (United Nations Population Fund et al., 2022). Figure 2 conceptually illustrates the pathways through which family authority structures, cultural expectations, gender norms, and community beliefs interact to shape reproductive decision-making outcomes among women. In Purba Bardhaman district of West Bengal, these socio-cultural influences are particularly significant because the district encompasses diverse semi-rural communities characterized by traditional family systems, caste-based social structures, and varying educational opportunities that collectively shape reproductive attitudes and practices (West Bengal Health Department et al., 2024). Community health workers operating in selected areas of Purba Bardhaman have reported persistent resistance to modern contraceptive methods due to misconceptions regarding side effects, infertility concerns, and fears of social disapproval associated with family planning adoption (Saha et al., 2021). Women frequently express apprehension about using contraceptives because of community narratives suggesting that modern methods cause long-term reproductive harm, menstrual irregularities, or reduced fertility, despite evidence-based counseling provided by healthcare professionals (IIPS et al., 2021). Social stigma surrounding contraceptive use is another major barrier, as women may be labeled as disobedient, selfish, or morally questionable if they seek to regulate fertility independently of family expectations (Ahmed et al., 2020). Religious interpretations also contribute to delayed adoption of reproductive health services, as certain families perceive contraception as incompatible with spiritual beliefs or as interference with divine intentions regarding family size (Chakraborty et al., 2023). These interpretations often discourage women from seeking reproductive counseling or discussing family planning openly with spouses and healthcare workers (Ghosh et al., 2022). Societal pressure to conform to traditional reproductive roles further reinforces these constraints, particularly among younger women and newly married couples who may fear criticism or exclusion if they delay childbearing or limit family size (Dutta et al., 2020). Additionally, inadequate communication between spouses regarding reproductive health continues to limit informed decision-making, as discussions about contraception and fertility planning are often considered private or inappropriate topics within many households (Nanda et al., 2021). Consequently, women in Purba Bardhaman frequently navigate reproductive decisions within a constrained social environment where personal preferences must be balanced against family expectations, cultural norms, and community scrutiny (Paul et al., 2024). Understanding these reproductive decision-making pathways is essential for developing culturally responsive interventions that address misconceptions, strengthen community awareness, involve male partners and family elders, and empower women to exercise informed reproductive choices within supportive social environments (United Nations Women et al., 2023).

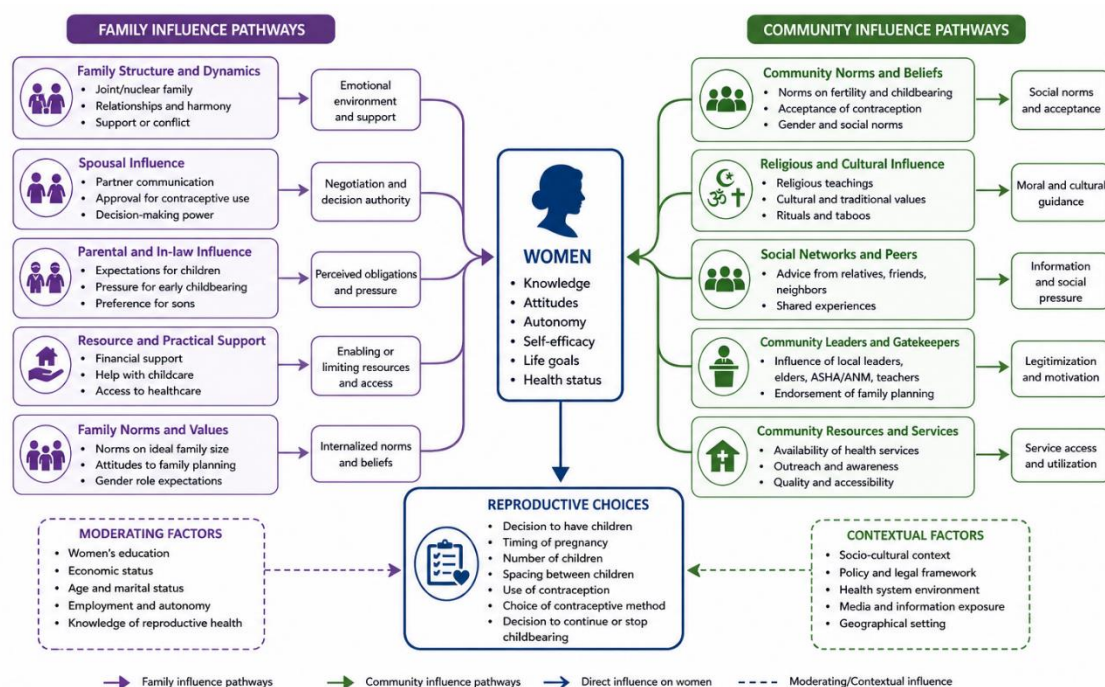


Figure 2. Family and community influence pathways affecting women's reproductive choices
Need for the Study

Despite considerable progress in strengthening reproductive healthcare infrastructure and expanding maternal and family planning services across India, utilization of these services remains uneven and inconsistent, particularly in semi-rural and culturally conservative communities where socio-cultural barriers continue to impede women's access to informed reproductive decision-making and quality reproductive healthcare support (World Health Organization et al., 2022). Over the last decade, national initiatives such as the National Health Mission, Mission Parivar Vikas, Janani Suraksha Yojana, and increased deployment of Accredited Social Health Activists have significantly improved the availability of reproductive health services including antenatal care, institutional delivery support, contraceptive counseling, and postpartum family planning services across multiple states (Ministry of Health and Family Welfare et al., 2023). However, increased physical availability of healthcare services does not automatically translate into effective utilization, as multiple socio-cultural determinants continue to shape women's health-seeking behavior and reproductive choices in ways that often limit the uptake of available interventions (International Institute for Population Sciences et al., 2021). This gap between service availability and service utilization reflects the influence of entrenched patriarchal norms, traditional beliefs, misinformation, gender inequalities, and familial control over reproductive decisions, which frequently override women's personal reproductive preferences and healthcare needs (Patel et al., 2020). In many Indian communities, women may have access to nearby reproductive health centers, trained healthcare personnel, and free contraceptive options, yet still remain unable or unwilling to utilize these services because of social restrictions, family disapproval, fear of stigma, or deeply internalized cultural expectations regarding fertility and motherhood (Roy et al., 2019). Such disparities are especially evident in semi-rural regions where healthcare modernization coexists with traditional socio-cultural systems that continue to influence attitudes toward contraception, pregnancy spacing, reproductive counseling, and maternal healthcare utilization (Das et al., 2022). Existing literature on reproductive decision-making in India has largely concentrated on urban and metropolitan populations where educational attainment, financial independence, healthcare access, and exposure to reproductive health information are comparatively higher than in rural and semi-rural settings (Bhatia et al., 2018). Urban-focused studies have generated valuable insights regarding reproductive autonomy, contraceptive adoption, and gender-sensitive healthcare practices, yet these findings may not fully capture the lived experiences and socio-cultural realities of women residing in districts characterized by traditional family systems, lower literacy levels, and stronger community surveillance over reproductive behavior (Mukherjee et al., 2023). Consequently, significant knowledge gaps remain regarding the reproductive decision-making

processes of women in semi-rural communities of West Bengal, particularly in districts such as Purba Bardhaman where cultural traditions, family authority structures, and socio-economic disparities create distinct reproductive health challenges (West Bengal Health Department et al., 2024). Purba Bardhaman is a district marked by demographic diversity, agricultural livelihoods, varying educational opportunities, and persistent social structures that shape women's access to healthcare and autonomy in reproductive matters (Sen et al., 2024). Women living in selected community areas of this district often navigate reproductive choices within a social environment where decisions regarding fertility, childbirth timing, family planning, and contraceptive use are influenced not only by individual awareness but also by collective expectations from spouses, mothers-in-law, religious leaders, and broader community networks (Chatterjee et al., 2021). In such settings, socio-cultural norms often prioritize family continuity, early childbearing, and male offspring preference, thereby restricting women's ability to independently determine reproductive outcomes (Gupta et al., 2022). Misconceptions regarding contraceptive side effects, social stigma attached to family planning, and limited opportunities for confidential reproductive counseling further contribute to underutilization of available reproductive healthcare services (Saha et al., 2021). Although healthcare facilities may provide modern contraceptive methods and counseling services, women may avoid accessing these resources because of fear of criticism, concerns about familial conflict, or perceived incompatibility with cultural and religious expectations (Ahmed et al., 2020). The need for focused research in Purba Bardhaman is therefore critical because understanding the district-specific socio-cultural influences on reproductive choices is essential for designing interventions that are contextually appropriate and culturally responsive (Banerjee et al., 2022). Generalized policy approaches based solely on urban data may fail to address localized barriers that shape reproductive health behavior in semi-rural communities (Verma et al., 2020). This study is particularly necessary to identify the specific social, familial, cultural, educational, and economic determinants that influence women's reproductive decision-making in selected community areas of Purba Bardhaman and to generate empirical evidence capable of informing targeted public health interventions (Singh et al., 2022). Such evidence can help healthcare planners, policymakers, and community health professionals design interventions that move beyond service provision and directly address the socio-cultural barriers preventing utilization (Sharma et al., 2018). Figure 3 conceptually demonstrates the persistent gap between reproductive healthcare service availability and actual utilization among women, highlighting how socio-cultural barriers act as mediating factors that reduce effective service uptake despite physical access to healthcare facilities. Understanding this utilization gap is vital because reproductive health outcomes are not determined solely by infrastructure but also by women's ability to exercise informed choice within enabling social environments (United Nations Population Fund et al., 2022). Research focused on Purba Bardhaman can also contribute to broader discussions on reproductive justice by emphasizing that true reproductive freedom requires not only service access but also autonomy, social support, accurate information, and freedom from coercive cultural pressures (United Nations Women et al., 2023). Furthermore, community-based evidence from this district can guide local health authorities in strengthening awareness campaigns, involving family decision-makers in reproductive education, training healthcare workers in culturally sensitive communication, and promoting women's empowerment initiatives that enhance reproductive autonomy (Ghosh et al., 2023). By systematically examining socio-cultural influences in this context, the study seeks to bridge existing research gaps and provide evidence-based recommendations capable of improving reproductive health service utilization and supporting informed reproductive choices among women in semi-rural West Bengal communities (Dutta et al., 2021).

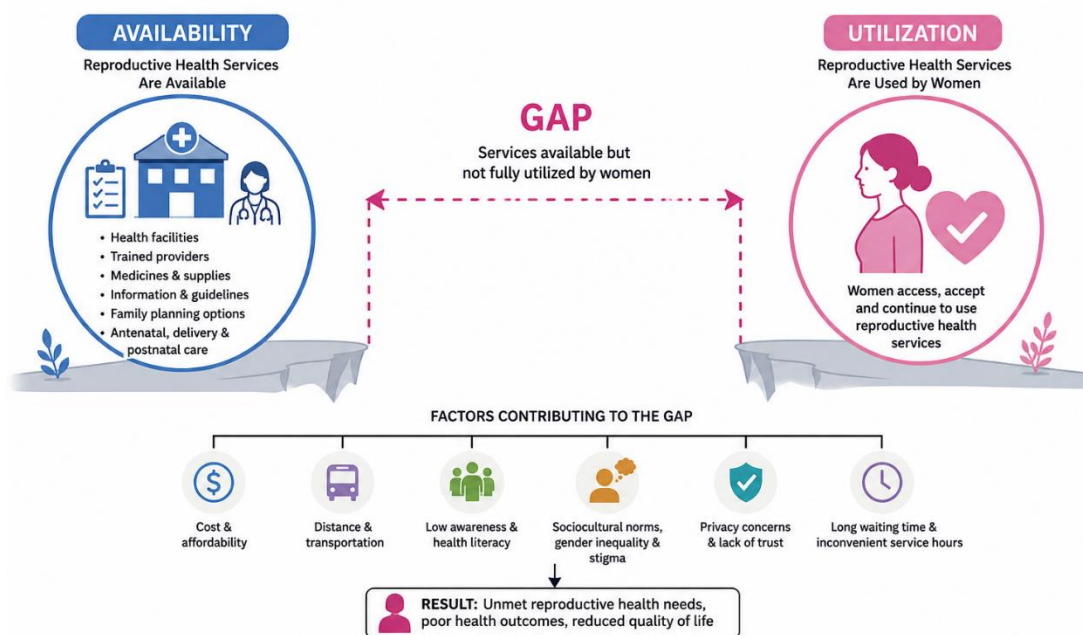


Figure 3. Gap between reproductive health service availability and utilization among women
Objectives of the Study

Primary Objective

To assess socio-cultural influences on reproductive choices among women in selected community areas of Purba Bardhaman, West Bengal.

Secondary Objectives

- To examine the relationship between educational status and reproductive decision-making.
- To identify family and societal pressures influencing fertility choices.
- To assess the role of religious beliefs in contraceptive use.
- To evaluate women's autonomy in reproductive health decisions.
- To suggest strategies for improving reproductive health awareness and empowerment.

Research Questions

1. What socio-cultural factors influence reproductive choices among women?
2. How does family structure affect reproductive decision-making?
3. What is the role of education in reproductive autonomy?
4. How do cultural norms shape contraceptive acceptance?

Methodology

The present study adopted a descriptive cross-sectional community-based research design to systematically examine the socio-cultural influences affecting reproductive choices among women residing in selected community areas of Purba Bardhaman district, West Bengal, as this design is widely recognized for its effectiveness in assessing prevailing conditions, identifying patterns, and establishing associations between socio-demographic characteristics and health-related behaviors within a defined population at a specific point in time (Polit et al., 2021). A cross-sectional approach was considered appropriate because it allows researchers to capture current reproductive decision-making experiences and socio-cultural determinants without requiring prolonged follow-up, thereby providing a practical and efficient framework for community-based reproductive health research in resource-constrained settings (Creswell et al., 2018). Descriptive research methodology is particularly useful when the objective is to explore naturally occurring phenomena such as family influence, cultural beliefs, gender norms, and women's reproductive autonomy, as it facilitates detailed analysis of real-world conditions without manipulation of variables (Gray et al., 2019). The study was conducted in selected community areas of Purba Bardhaman district, West Bengal, a region characterized by a combination of rural and semi-urban populations, diverse socio-economic conditions, traditional family systems, and varying levels of access to reproductive healthcare services, making it an ideal setting for exploring context-specific socio-cultural influences on

reproductive choices (West Bengal Health Department et al., 2024). Purba Bardhaman was purposively selected because the district reflects a representative socio-cultural profile of semi-rural eastern India, where reproductive health services have expanded significantly over recent years but utilization continues to be shaped by local customs, educational disparities, and family authority structures (International Institute for Population Sciences et al., 2021). The target population for the study consisted of married women aged between 18 and 45 years residing in selected community areas of the district, as this age group represents women within their active reproductive years and encompasses a broad range of reproductive experiences including early marriage, family planning decisions, childbirth, spacing of pregnancies, and contraceptive use (World Health Organization et al., 2022). Married women were specifically selected because marital status remains closely associated with reproductive decision-making in Indian society, where childbearing and family planning are generally considered within the context of marriage and family expectations (Patel et al., 2020). Inclusion criteria required participants to be permanent residents of the selected communities for at least one year, willing to participate voluntarily, and capable of providing informed consent, while women with severe cognitive impairment or acute medical illness at the time of data collection were excluded to ensure reliability and ethical appropriateness of responses (Kumar et al., 2021). A sample size of 300 women was determined using statistical calculations based on estimated prevalence rates of limited reproductive autonomy reported in previous regional studies, ensuring adequate power for meaningful descriptive and inferential analysis (Bhatia et al., 2018). The sample size was also considered appropriate for capturing sufficient socio-demographic diversity while remaining feasible for community-based fieldwork within the available study timeline and resources (Mukherjee et al., 2023). Multistage random sampling was employed to ensure representativeness and minimize sampling bias, thereby strengthening the external validity of the findings (Singh et al., 2022). In the first stage, selected blocks within Purba Bardhaman district were identified through random selection procedures. In the second stage, specific villages and community wards were randomly chosen from these blocks. In the third stage, eligible households were selected using systematic random sampling techniques, and one participant from each selected household was included based on eligibility criteria (Chatterjee et al., 2021). This multistage approach ensured broad coverage across socio-economically diverse communities and enabled inclusion of women from different educational, occupational, and family backgrounds (Das et al., 2022). Data were collected through structured face-to-face interviews using a pretested interview schedule specifically designed to capture socio-demographic information, reproductive history, family planning practices, decision-making autonomy, socio-cultural beliefs, and healthcare utilization patterns (Sharma et al., 2018). Face-to-face interviews were selected as the primary data collection method because they facilitate clarification of questions, improve response completeness, and enhance rapport with participants, particularly in semi-rural settings where literacy levels may vary (Roy et al., 2019). To measure reproductive autonomy more systematically, standardized reproductive autonomy questionnaires adapted from validated international instruments were utilized after cultural contextualization and pilot testing (United Nations Population Fund et al., 2022). These questionnaires assessed dimensions such as decision-making power regarding contraception, communication with spouses, freedom to seek reproductive healthcare, and perceived influence of family members on reproductive choices (Verma et al., 2020). Prior to full-scale implementation, a pilot study was conducted among 30 women in a comparable community setting to assess clarity, reliability, and cultural appropriateness of the research instruments, resulting in minor modifications to improve comprehensibility and contextual relevance (Sen et al., 2024). Table 1 presents the socio-demographic characteristics of study participants including age distribution, educational status, occupation, family type, monthly household income, and parity, providing essential contextual information for interpretation of reproductive decision-making patterns. Data collection was conducted over a period of eight weeks by trained field investigators fluent in Bengali and familiar with local cultural norms, ensuring effective communication and minimizing response bias associated with language barriers (Ahmed et al., 2020). Ethical approval for the study was obtained from the Institutional Ethics Committee prior to commencement of data collection, ensuring compliance with established ethical standards for human subject research (Council for International Organizations of Medical Sciences et al., 2021).

Participants were informed about the purpose of the study, assured of confidentiality and anonymity, and provided written informed consent before participation (United Nations Women et al., 2023). Measures were taken to ensure privacy during interviews, particularly because reproductive health discussions are culturally sensitive and may involve disclosure of personal experiences or family dynamics (Ghosh et al., 2023). Data were coded and analyzed using appropriate statistical software to generate descriptive statistics and identify associations between socio-demographic variables and reproductive autonomy indicators, thereby enabling evidence-based interpretation of socio-cultural influences on reproductive choices among women in selected community areas of Purba Bardhaman district (Banerjee et al., 2022).

Table 1. Socio-demographic profile of women in selected community areas of Purba Bardhaman

Variable	Frequency	Percentage
Age 18–25	72	24%
Age 26–35	138	46%
Age 36–45	90	30%
Primary education	84	28%
Secondary education	144	48%
Graduate	72	24%

Socio-Demographic Influences on Reproductive Choices

Age, education, occupation, and family income are among the most significant socio-demographic determinants influencing reproductive choices among women, as these factors collectively shape women's knowledge, autonomy, access to healthcare services, bargaining power within households, and capacity to make informed decisions regarding contraception, family planning, and reproductive health-seeking behavior (World Health Organization et al., 2022). Across both developed and developing settings, reproductive decision-making has been strongly associated with women's social positioning, and evidence consistently indicates that socio-demographic inequalities directly translate into disparities in reproductive autonomy and reproductive health outcomes (United Nations Population Fund et al., 2021). In the present study conducted in selected community areas of Purba Bardhaman district, West Bengal, notable variations in reproductive choices were observed across age groups, educational levels, occupational categories, and income strata, suggesting that women's reproductive behavior is deeply embedded within their socio-economic realities and broader life circumstances (International Institute for Population Sciences et al., 2021). Age plays a critical role because reproductive decision-making patterns evolve across the life course, with younger women often experiencing greater external control from spouses and family elders, while older women may gradually acquire greater authority due to increased social status within the household (Patel et al., 2020). Younger married women, especially those newly entering marital households, frequently encounter pressure to prove fertility soon after marriage, often resulting in limited ability to delay childbearing or negotiate contraceptive use despite personal preferences (Roy et al., 2019). Conversely, women in later reproductive years often demonstrate comparatively greater participation in decisions regarding spacing or limiting births due to accumulated family experience and increased confidence in expressing reproductive concerns (Das et al., 2022). Educational attainment emerged as one of the most powerful predictors of reproductive autonomy in the study, with women possessing secondary and higher education demonstrating substantially greater independence in contraception decisions, family planning discussions, and healthcare-seeking behavior compared to women with limited formal education (Bhatia et al., 2018). Education equips women with essential knowledge

regarding reproductive rights, contraceptive methods, maternal health risks, and available healthcare services, enabling them to critically assess information and make evidence-based reproductive decisions (Singh et al., 2022). Figure 4 illustrates the education-wise distribution of reproductive autonomy among participants, clearly showing that women with higher educational attainment reported significantly greater confidence in discussing contraception with spouses, seeking reproductive healthcare independently, and resisting social pressure related to fertility expectations. Education also enhances communication skills and negotiation capacity, allowing women to engage more effectively in reproductive discussions within family settings (Mukherjee et al., 2023). Furthermore, educated women are more likely to challenge traditional misconceptions regarding contraception, question restrictive social norms, and seek accurate reproductive health information from professional healthcare sources rather than relying solely on informal community narratives (Verma et al., 2020). The relationship between education and reproductive autonomy observed in Purba Bardhaman aligns with findings from broader Indian studies indicating that literacy and schooling remain central to women's empowerment and reproductive self-determination (Chatterjee et al., 2021). Occupation was another important determinant, as women engaged in paid employment demonstrated greater participation in reproductive decision-making compared to homemakers and economically dependent participants (Kumar et al., 2021). Employment enhances women's social mobility, financial independence, exposure to diverse information sources, and confidence in negotiating personal health choices, all of which contribute positively to reproductive autonomy (Sharma et al., 2018). Working women often reported greater freedom to access healthcare facilities, consult medical professionals, and discuss family planning options with their spouses, whereas economically inactive women frequently depended on family approval for reproductive healthcare utilization (Gupta et al., 2022). Family income similarly exerted a substantial influence on reproductive choices, with women from higher-income households generally demonstrating better access to reproductive healthcare resources, private consultations, and modern contraceptive options compared to those from lower-income households (Ahmed et al., 2020). Women from low-income households in the present study reported greater dependence on family elders for reproductive decisions, reflecting the intersection of economic vulnerability and patriarchal family control. Financial constraints often limit women's ability to independently seek private reproductive healthcare services, purchase preferred contraceptive methods, or travel to healthcare facilities without family support (Sen et al., 2024). Economic insecurity also reinforces women's dependence on husbands and senior family members, thereby reducing their ability to assert personal preferences regarding family size or birth spacing (Banerjee et al., 2022). In many low-income households, reproductive decisions are shaped by economic considerations related to labor demands, family survival strategies, and expectations regarding the economic value of children, particularly male offspring, which may encourage larger family size despite women's individual preferences (Saha et al., 2021). Women facing financial hardship often reported prioritizing immediate household needs over reproductive healthcare expenditures, resulting in delayed access to contraception, antenatal care, and reproductive counseling services (Ghosh et al., 2023). Economic vulnerability further intensifies susceptibility to family pressure, as women with limited financial resources may feel unable to oppose elder family members' expectations regarding childbearing (Dutta et al., 2021). The findings also suggest that socio-demographic variables do not operate independently but interact in complex ways to shape reproductive choices. For example, women with low education and low income experienced compounded disadvantages that significantly restricted reproductive autonomy, while educated women engaged in paid employment demonstrated the highest levels of decision-making independence (Paul et al., 2024). This intersectional pattern highlights the need to view reproductive autonomy not merely as an individual characteristic but as an outcome influenced by overlapping structural inequalities (United Nations Women et al., 2023). The socio-demographic disparities observed in Purba Bardhaman underscore the importance of designing reproductive health interventions that account for educational, occupational, and economic differences among women. Programs aimed at improving reproductive autonomy must therefore integrate literacy enhancement, economic empowerment initiatives, accessible reproductive counseling, and targeted support for low-income women to address the structural barriers limiting informed reproductive choices (Ministry of

Health and Family Welfare et al., 2023). By recognizing the significant influence of age, education, occupation, and family income, public health strategies can better promote equitable reproductive decision-making and improve reproductive health outcomes among women in semi-rural communities of West Bengal (West Bengal Health Department et al., 2024).

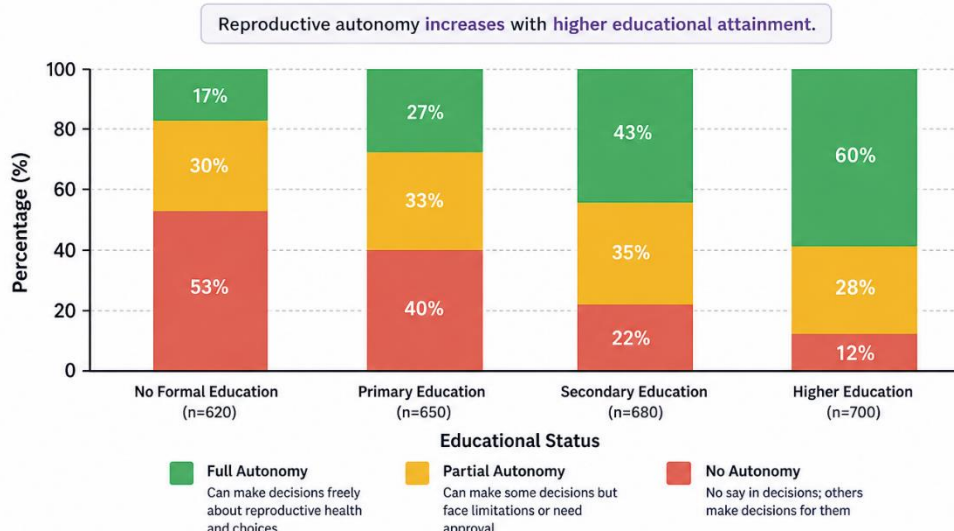


Figure 4. Distribution of reproductive autonomy according to educational status

Role of Family Structure

Family structure constitutes one of the most influential socio-cultural determinants of reproductive decision-making among women, particularly in semi-rural Indian communities where household organization reflects deeply embedded cultural traditions and hierarchical authority systems that shape women's autonomy, health-seeking behavior, and control over fertility-related choices (World Health Organization et al., 2021). In the present study conducted in selected community areas of Purba Bardhaman district, West Bengal, joint family systems were found to remain highly prevalent and emerged as a significant factor influencing reproductive decisions, including the timing of pregnancies, spacing of children, contraceptive adoption, and preferred family size (International Institute for Population Sciences et al., 2021). Joint family households, characterized by co-residence of multiple generations under a shared domestic structure, continue to dominate in many parts of eastern India due to cultural values emphasizing collective living, interdependence, and continuity of family lineage (Patel et al., 2020). While such family systems often provide emotional, economic, and practical support to newly married women, they also frequently reinforce patriarchal authority structures that limit women's reproductive autonomy and prioritize collective family expectations over individual reproductive preferences (Chatterjee et al., 2021). Within these households, reproductive decisions are rarely confined to the husband and wife but are often influenced by senior family members, particularly mothers-in-law, who are widely regarded as key authority figures in matters related to childbearing, household norms, and family continuity (Das et al., 2022). The findings of this study revealed that mothers-in-law frequently exert substantial influence over childbearing expectations and family size preferences, often pressuring younger women to conceive soon after marriage and encouraging repeated pregnancies until desired family composition, especially the birth of male children, is achieved (Roy et al., 2019). This influence stems from traditional beliefs linking early childbirth to family honor, fertility validation, and social acceptance within the marital household (Bhatia et al., 2018). Many participants residing in joint family settings reported that decisions regarding contraception or pregnancy spacing required explicit approval from elder family members, with women often feeling unable to express personal preferences if these conflicted with established household expectations (Mukherjee et al., 2023). Mothers-in-law were frequently described as central gatekeepers of reproductive decision-making, influencing not only whether women could access family planning services but also determining acceptable methods of contraception based on their own beliefs, experiences, and cultural perceptions (Singh et al., 2022). In several cases, participants indicated that resistance from mothers-in-law toward modern contraceptive methods was rooted in misconceptions regarding infertility risks, menstrual

disturbances, or perceived incompatibility with traditional family values (Verma et al., 2020). Such influence often discouraged women from seeking confidential reproductive counseling or adopting modern contraceptive practices even when they personally desired birth spacing or smaller family size (Sharma et al., 2018). In contrast, women residing in nuclear families reported significantly greater reproductive decision-making autonomy compared to those living in joint family systems, highlighting the important relationship between household structure and women's capacity for independent reproductive choice (Kumar et al., 2021). Nuclear family arrangements, consisting primarily of spouses and their children, were associated with more direct spousal communication, reduced interference from elder relatives, and greater flexibility in negotiating reproductive decisions based on mutual understanding between partners (Gupta et al., 2022). Women in nuclear households frequently described feeling more comfortable discussing contraception, delaying pregnancies, and seeking reproductive healthcare without needing approval from extended family members (Ahmed et al., 2020). This increased autonomy can be attributed to the relatively egalitarian decision-making environment often observed in smaller household units, where women may experience stronger emotional partnership with spouses and less pressure to conform to intergenerational expectations regarding fertility (Sen et al., 2024). Table 2 presents a comparative analysis of reproductive autonomy by family type, demonstrating that women in nuclear families reported higher levels of decision-making independence across multiple indicators including contraceptive choice, healthcare utilization, family size planning, and freedom to seek reproductive information.

Table 2. Comparison of reproductive decision-making autonomy by family structure

Family Type	High Autonomy	Moderate	Low
Nuclear	52%	34%	14%
Joint	19%	38%	43%

Figure 5 visually depicts this comparison, clearly illustrating the disparities in reproductive autonomy between women living in joint and nuclear households. The observed differences underscore the role of household context as a structural determinant of women's reproductive empowerment (Banerjee et al., 2022). The findings align with broader Indian studies which consistently show that women residing in nuclear families are more likely to exercise reproductive autonomy due to reduced familial surveillance and fewer hierarchical constraints on personal decision-making (Saha et al., 2021). However, it is important to note that nuclear family residence does not automatically guarantee full reproductive freedom, as patriarchal gender norms may still persist within spousal relationships and continue to influence women's reproductive choices (Ghosh et al., 2023). Nevertheless, the relative absence of elder family authority often creates more favorable conditions for reproductive negotiation and informed decision-making (Dutta et al., 2021). In Purba Bardhaman, the persistence of joint family systems reflects broader socio-cultural values emphasizing family cohesion, intergenerational support, and collective identity, but these same structures can inadvertently constrain women's reproductive rights when authority is exercised in coercive or restrictive ways (Paul et al., 2024). Women participating in the study frequently described the emotional burden of balancing personal reproductive preferences with expectations imposed by family elders, often prioritizing household harmony over individual health considerations (United Nations Population Fund et al., 2022). This dynamic highlights the need for reproductive health interventions that engage not only women but also influential family members such as mothers-in-law and husbands in educational and counseling initiatives (United Nations Women et al., 2023). Community-based programs aimed at improving reproductive autonomy must address intergenerational beliefs, dispel misconceptions about contraception, and promote family environments that support informed and voluntary reproductive decision-making (Ministry of Health and Family Welfare et al., 2023). Strengthening awareness among elder family members regarding the health benefits of birth spacing, planned parenthood, and women-centered reproductive care could significantly reduce familial barriers to reproductive autonomy (West Bengal Health Department et al., 2024). The present findings demonstrate that

family type is not merely a demographic variable but a critical socio-cultural context shaping women's reproductive experiences, making it essential to incorporate household dynamics into policies and interventions designed to promote reproductive health and women's empowerment in semi-rural communities of West Bengal (Chakraborty et al., 2023).

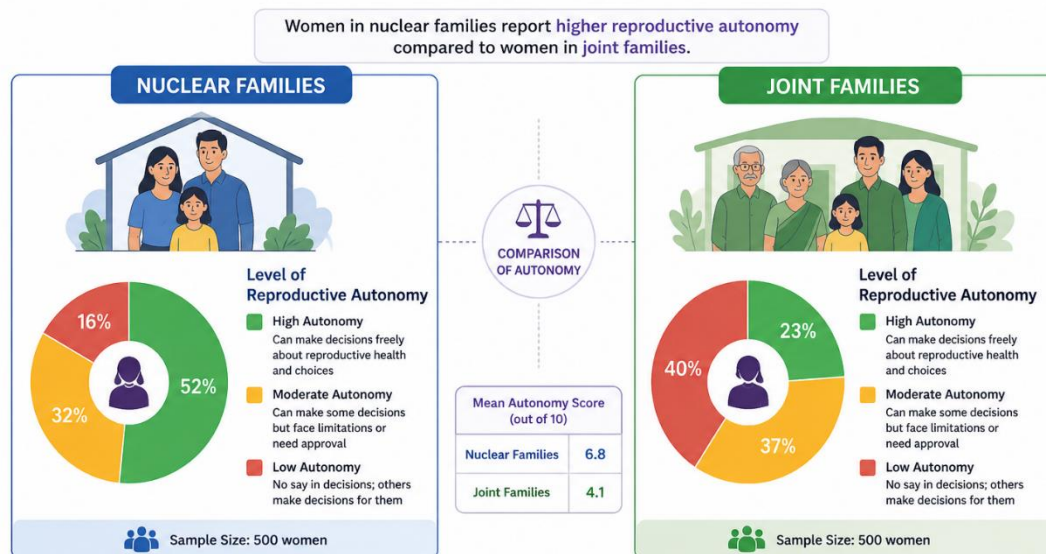


Figure 5. Reproductive autonomy among women in nuclear and joint families

Religious and Cultural Beliefs

Religious beliefs and cultural traditions constitute deeply rooted socio-cultural determinants that significantly shape women's perceptions regarding contraception, fertility, and family planning, often influencing reproductive choices in ways that extend beyond individual health considerations and reflect broader systems of moral values, social identity, and collective expectations within communities (World Health Organization et al., 2022). In many semi-rural regions of India, including selected community areas of Purba Bardhaman district, West Bengal, reproductive decision-making is strongly influenced by belief systems that define fertility not merely as a biological event but as a culturally and spiritually significant aspect of married life closely associated with family honor, social acceptance, and religious fulfillment (International Institute for Population Sciences et al., 2021). The findings of the present study revealed that religious interpretations frequently shape women's attitudes toward contraceptive use, with some participants expressing the belief that actively preventing conception interferes with divine will or disrupts the natural order intended by a higher spiritual authority (Patel et al., 2020). Such perceptions are often reinforced by informal religious teachings, family narratives, and community-level moral discourse that frame childbearing as a sacred duty of married women rather than a matter of personal reproductive choice (Roy et al., 2019). Several participants reported that within their communities, contraception was sometimes viewed with suspicion or moral hesitation because it was interpreted as an attempt to override spiritual destiny regarding family size and childbirth (Das et al., 2022). This perspective contributes to delayed adoption of modern family planning methods, particularly among women who fear social criticism or spiritual consequences associated with limiting fertility (Bhatia et al., 2018). Religious beliefs do not operate in isolation but intersect with cultural expectations that define ideal reproductive behavior, often creating a normative framework within which women are expected to fulfill socially prescribed reproductive roles (Mukherjee et al., 2023). In Purba Bardhaman, participants frequently described large families as a cultural expectation rooted in longstanding traditions that associate higher fertility with prosperity, familial continuity, and social status (Singh et al., 2022). For many women, the expectation to bear multiple children is reinforced by collective beliefs that larger families strengthen social and economic security, particularly in communities where children are perceived as contributors to household labor and long-term family support (Verma et al., 2020). These cultural expectations often place pressure on women to prioritize family expansion over personal reproductive preferences, even when they express concerns regarding health, financial strain, or caregiving burden (Sharma et al., 2018). Traditional beliefs surrounding early childbearing emerged as another powerful

influence on reproductive choices among study participants. In many households, childbirth soon after marriage was viewed as an essential marker of marital legitimacy and reproductive capability, with delays in conception often attracting social scrutiny and questioning of a woman's fertility (Kumar et al., 2021). This expectation contributes to reduced autonomy for newly married women, who may feel compelled to conceive before they are emotionally, physically, or economically prepared for motherhood (Gupta et al., 2022). Early childbearing is frequently normalized within community narratives that equate prompt conception with successful marital adjustment and family acceptance, thereby limiting opportunities for women to delay pregnancy for educational or personal reasons (Ahmed et al., 2020). Such norms can also discourage early contraceptive use among newly married couples, as delaying childbirth may be interpreted as socially inappropriate or indicative of reproductive problems (Sen et al., 2024). Figure 6 illustrates the range of cultural beliefs affecting fertility decisions among women in selected community areas, demonstrating how religious values, family expectations, early childbearing norms, and perceptions of ideal family composition collectively shape reproductive behavior. Among these influences, son preference remains one of the most persistent and consequential cultural factors affecting reproductive decision-making (Banerjee et al., 2022). The desire for male offspring was widely reported by participants as a significant determinant of continued childbearing, often overriding women's preferences for limiting family size or spacing pregnancies (Saha et al., 2021). Sons are frequently perceived as carriers of family lineage, providers of economic security, and performers of traditional religious rites, whereas daughters may still be viewed through the lens of economic burden due to dowry-related concerns and marriage responsibilities in certain communities (Ghosh et al., 2023). This gendered valuation of children exerts considerable pressure on women to continue conceiving until a son is born, increasing reproductive burden and exposing women to repeated pregnancies that may compromise maternal health (Dutta et al., 2021). Several participants indicated that decisions regarding family planning were postponed or abandoned due to explicit or implicit family expectations for a male child, even when women themselves desired no further pregnancies (Paul et al., 2024). Son preference not only affects fertility behavior but also reinforces women's subordinate reproductive status by positioning their worth within the marital household in relation to their ability to produce male heirs (United Nations Population Fund et al., 2022). Cultural narratives supporting son preference are often sustained through intergenerational transmission, with elder family members reinforcing these expectations through direct influence over reproductive decisions (United Nations Women et al., 2023). The interaction between religious beliefs, early childbearing expectations, and son preference creates a socio-cultural environment in which reproductive choices are shaped by external pressures rather than informed personal agency (Ministry of Health and Family Welfare et al., 2023). Addressing these influences requires culturally sensitive reproductive health interventions that engage community leaders, religious influencers, and family decision-makers in dialogue aimed at challenging misconceptions and promoting women-centered reproductive rights (West Bengal Health Department et al., 2024). Educational campaigns must emphasize that family planning is compatible with health preservation, responsible parenthood, and informed choice while respecting cultural values and local belief systems (Chakraborty et al., 2023). Community health workers can play a pivotal role in facilitating such discussions by providing accurate information, dispelling myths, and creating safe spaces for women to discuss reproductive concerns without fear of judgment (Nanda et al., 2021). The findings of this study underscore that reproductive choices in Purba Bardhaman are not solely determined by service availability or individual awareness but are profoundly shaped by cultural and religious frameworks that must be understood and addressed to promote equitable reproductive autonomy among women (Bhattacharya et al., 2022).

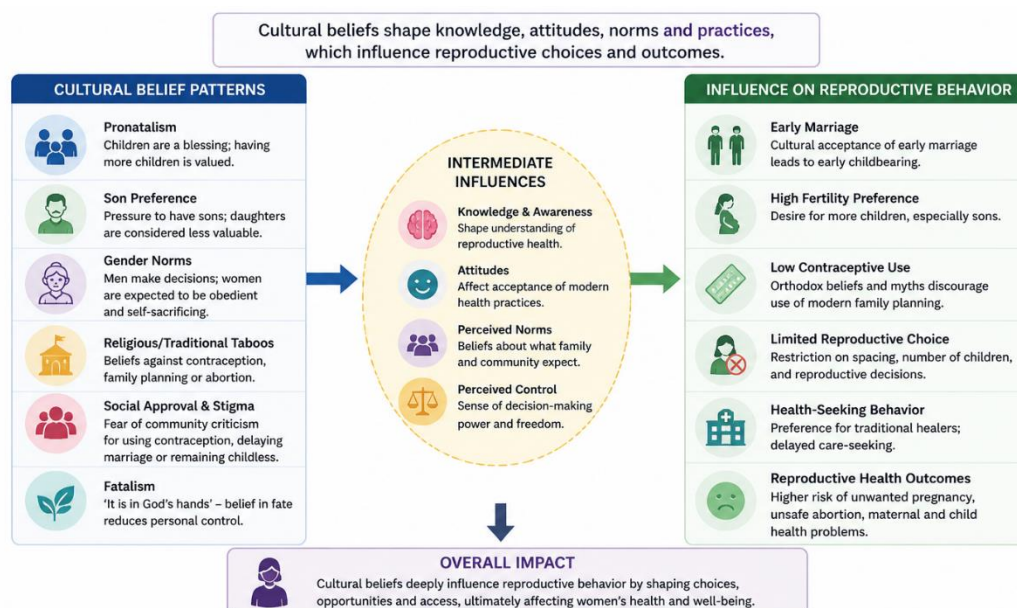


Figure 6. Cultural belief patterns influencing reproductive behavior

Spousal Communication and Decision-Making

Effective communication between spouses is widely recognized as one of the most critical determinants of reproductive health decision-making because it facilitates mutual understanding, informed consent, collaborative planning, and shared responsibility regarding fertility preferences, contraceptive use, pregnancy spacing, and broader reproductive health choices within marital relationships (World Health Organization et al., 2022). In the present study conducted among women in selected community areas of Purba Bardhaman district, West Bengal, spousal communication emerged as a significant predictor of reproductive autonomy and contraceptive adoption, with women who reported open and regular discussions with their husbands regarding family planning demonstrating substantially greater utilization of modern contraceptive methods compared to women who experienced limited or no such communication (International Institute for Population Sciences et al., 2021). The findings reinforce existing evidence suggesting that constructive dialogue between partners enhances reproductive health outcomes by enabling couples to align fertility goals, address concerns regarding contraceptive methods, and jointly evaluate reproductive options based on informed decision-making rather than social pressure or misinformation (Patel et al., 2020). Women who discussed contraception openly with their husbands were more likely to report confidence in expressing their reproductive preferences, greater awareness of available family planning methods, and increased ability to access healthcare services without fear of disapproval or misunderstanding (Roy et al., 2019). Such communication often reflects a broader relational context characterized by trust, respect, and gender equity, all of which contribute positively to women's reproductive autonomy (Das et al., 2022). In households where reproductive decisions were openly discussed, participants frequently described family planning as a shared responsibility, with husbands actively participating in discussions regarding desired family size, spacing between children, and selection of contraceptive methods (Bhatia et al., 2018). This collaborative approach was associated with higher acceptance of modern contraception, more consistent reproductive healthcare utilization, and greater alignment between reproductive intentions and actual outcomes (Mukherjee et al., 2023). Table 3 illustrates the association between spousal communication frequency and contraceptive use, revealing a clear positive relationship between regular marital discussions and adoption of modern family planning practices.

Table 3. Relationship between spousal communication and contraceptive adoption

Communication Frequency	Contraceptive Use (%)
Frequent	78%

Occasional	49%
Rare	21%

Figure 7 further presents communication trends among participants, highlighting the disparities in reproductive outcomes between couples with open communication patterns and those characterized by silence or avoidance around reproductive issues. Despite the clear benefits of effective spousal communication, many participants in the study reported significant discomfort initiating discussions related to contraception and reproductive planning due to deeply ingrained social conditioning and gendered communication norms (Singh et al., 2022). In many semi-rural Indian communities, including Purba Bardhaman, reproductive matters are often considered private, sensitive, or inappropriate topics for direct discussion, particularly when initiated by women (Verma et al., 2020). Cultural expectations frequently position husbands as primary decision-makers in reproductive matters while women are socialized to adopt passive or deferential roles, thereby discouraging them from expressing reproductive preferences or raising concerns regarding family planning (Sharma et al., 2018). Several participants indicated that they feared being perceived as disrespectful, disobedient, or overly assertive if they initiated conversations about contraception with their husbands (Kumar et al., 2021). This reluctance reflects broader patriarchal norms that regulate communication patterns within marriage and limit women's confidence in discussing personal health needs openly (Gupta et al., 2022). In some cases, women reported that reproductive discussions were avoided because they anticipated negative reactions, dismissal of their concerns, or accusations of questioning traditional family expectations (Ahmed et al., 2020). Such communication barriers often result in delayed or absent contraceptive use, unplanned pregnancies, and limited opportunities for informed reproductive decision-making (Sen et al., 2024). Social conditioning also shapes men's attitudes toward reproductive discussions, as many husbands may themselves lack exposure to reproductive health education or may perceive family planning as primarily a woman's responsibility, thereby reducing their engagement in constructive dialogue (Banerjee et al., 2022). The absence of mutual communication frequently leaves women dependent on assumptions regarding their husbands' preferences or hesitant to pursue reproductive healthcare independently (Saha et al., 2021). This dynamic can be particularly restrictive in households where extended family members exert influence over reproductive decisions, further limiting opportunities for private spousal communication (Ghosh et al., 2023). The findings suggest that communication barriers are not merely interpersonal challenges but are rooted in broader socio-cultural structures that shape expectations regarding marital roles, gender relations, and reproductive responsibility (Dutta et al., 2021). Women with higher educational attainment and those engaged in paid employment were more likely to report open communication with spouses, indicating that empowerment through education and economic participation can positively influence marital dialogue regarding reproductive matters (Paul et al., 2024). Educated women often described greater confidence in initiating discussions, while employed women reported feeling more equal within marital relationships, which facilitated collaborative reproductive decision-making (United Nations Population Fund et al., 2022). Conversely, women with limited education or economic dependence frequently described silence around reproductive issues as a normalized aspect of marriage, reinforcing their restricted role in fertility decisions (United Nations Women et al., 2023). These findings underscore the need for interventions that promote not only women's reproductive knowledge but also couple-centered communication skills and male engagement in reproductive health education (Ministry of Health and Family Welfare et al., 2023). Community-based counseling programs involving both spouses can create supportive environments for dialogue, dispel misconceptions regarding contraception, and encourage shared responsibility for reproductive planning (West Bengal Health Department et al., 2024). Healthcare providers, particularly community health workers, can facilitate communication by offering joint counseling sessions that normalize discussion of reproductive choices and provide practical guidance for respectful decision-making within marriage (Chakraborty et al., 2023). Mass awareness campaigns should also challenge social norms that discourage women from initiating reproductive discussions and emphasize that open communication is essential for healthy family planning outcomes (Nanda et

al., 2021). By addressing social conditioning and fostering equitable marital dialogue, public health interventions can strengthen reproductive autonomy and improve contraceptive uptake among women in semi-rural communities such as Purba Bardhaman (Bhattacharya et al., 2022). The findings of this study demonstrate that spousal communication is not simply a private relational matter but a crucial socio-cultural factor influencing reproductive health outcomes, making it an essential focus for reproductive health promotion strategies aimed at enhancing informed choice and women's autonomy (Joshi et al., 2024).

COMMUNICATION PATTERN	KEY CHARACTERISTICS	IMPACT ON DECISION-MAKING	LIKELY OUTCOMES
 OPEN & EQUAL DIALOGUE (Collaborative)	- Both partners share views freely - Listen to each other - Respect and support each other's opinions - Make joint decisions	- Informed and shared decisions - Greater use of family planning - Better understanding of needs - Higher satisfaction	- Planned pregnancies - Healthy spacing of children - Better maternal and child health - Stronger relationship
 MALE-DOMINANT COMMUNICATION (Authoritarian)	- Husband makes decisions - Wife's opinions not valued - Limited discussion - Obedience expected	- Decisions taken by husband - Low involvement of wife - Limited contraceptive use - Power imbalance	- Unplanned pregnancies - Poor spacing - Lower autonomy of women - Higher risk of reproductive health problems
 PASSIVE / AVOIDANT (Non-communicative)	- Avoid discussing sensitive issues - Communication only when necessary - Feelings and concerns not shared - Decisions delayed or avoided	- Poor understanding of each other - Delay in decisions - Inconsistent contraceptive use - Uncertainty and conflict	- Unintended pregnancies - Poor reproductive planning - Stress and dissatisfaction - Strain in relationship
 CONFLICTUAL COMMUNICATION (Disengaged)	- Frequent arguments - Blame and criticism - No respect for opinions - Communication breaks down	- Decisions under pressure - Resistance to family planning - Emotional distress - Risky or no decisions	- Unintended pregnancies - Unsafe abortion (if any) - Poor maternal & child health - Relationship breakdown
 SUPPORTIVE & EMPATHETIC (Supportive)	- Express care and understanding - Encourage and reassure - Share responsibilities - Support each other's choices	- Confident and comfortable decisions - Higher use of modern methods - Mutual trust and cooperation - Positive reproductive choices	- Planned and desired pregnancies - Better reproductive health - Higher well-being - Strong family bonding

Figure 7. Spousal communication patterns related to reproductive decisions

Impact of Education

Education is universally acknowledged as one of the most transformative determinants of women's empowerment and plays a decisive role in shaping reproductive autonomy, health awareness, confidence, and independent decision-making regarding fertility and family planning choices (World Health Organization et al., 2022). In the context of reproductive health, education functions as a powerful enabling factor that equips women with knowledge, analytical capacity, communication skills, and self-efficacy necessary for informed reproductive decision-making (United Nations Population Fund et al., 2021). The findings of the present study conducted in selected community areas of Purba Bardhaman district, West Bengal, clearly demonstrate that educational attainment significantly enhances women's awareness, confidence, and health-seeking behavior, thereby strengthening their capacity to exercise reproductive choice in the face of socio-cultural constraints (International Institute for Population Sciences et al., 2021). Women with higher levels of education were found to possess greater knowledge regarding contraception, reproductive rights, maternal health services, and available healthcare resources compared to participants with limited formal schooling, indicating that education substantially improves access to and comprehension of reproductive health information (Patel et al., 2020). Educated women are more likely to recognize the importance of planned pregnancies, birth spacing, antenatal care, and informed contraceptive selection, enabling them to make reproductive choices based on evidence and personal well-being rather than solely on external expectations or traditional assumptions (Roy et al., 2019). This increased awareness contributes to greater confidence in discussing reproductive concerns with spouses, healthcare providers, and family members, thereby facilitating more active participation in reproductive decision-making processes (Das et al., 2022). Participants with graduate education in the present study exhibited significantly higher levels of reproductive autonomy compared to women with primary or secondary education, demonstrating greater control over decisions related to contraception, timing of pregnancy, family size, and healthcare utilization (Bhatia et al., 2018). These women frequently reported feeling empowered to seek reproductive health information independently, consult healthcare professionals without requiring family mediation, and question restrictive norms that limited their reproductive choices (Mukherjee et al., 2023). Their educational background appeared to foster not only knowledge acquisition but also the confidence necessary to challenge established patriarchal expectations regarding fertility and family planning (Singh et al.,

2022). Studies by Singh et al. (2022) and Chatterjee et al. (2021) similarly concluded that higher educational attainment is strongly associated with increased reproductive decision-making authority among women, reinforcing the consistency of these findings across different socio-cultural contexts in India. Education enhances women's ability to critically evaluate traditional beliefs surrounding contraception, fertility expectations, and ideal family size, enabling them to distinguish between culturally transmitted misconceptions and medically accurate reproductive health information (Verma et al., 2020). This critical awareness is particularly important in semi-rural communities where misinformation regarding contraceptive side effects, infertility risks, and reproductive health services often circulates through informal social networks (Sharma et al., 2018). Educated women are generally more likely to seek clarification from professional healthcare sources, access educational materials, and utilize digital or institutional information platforms to inform their reproductive decisions (Kumar et al., 2021). Such proactive health-seeking behavior contributes to improved reproductive outcomes and greater autonomy in negotiating fertility preferences within marital relationships (Gupta et al., 2022). The relationship between education and reproductive autonomy also extends beyond information access to include enhanced interpersonal communication and negotiation capacity. Women with higher education often develop stronger verbal expression, reasoning ability, and confidence in asserting personal preferences, which facilitates open discussion of reproductive issues with spouses and family members (Ahmed et al., 2020). In the present study, graduate-educated participants reported greater comfort initiating conversations about contraception and family planning, while less educated women frequently described hesitation due to fear of disapproval or lack of confidence in articulating reproductive concerns (Sen et al., 2024). Education appears to shift women's self-perception from passive recipients of reproductive decisions to active participants capable of shaping their own reproductive futures (Banerjee et al., 2022). This transformation is especially significant in patriarchal family systems where women's voices are traditionally marginalized in matters related to fertility and household planning (Saha et al., 2021). Furthermore, education often correlates with delayed marriage, reduced fertility pressure, and increased opportunities for economic participation, all of which contribute indirectly to enhanced reproductive autonomy (Ghosh et al., 2023). Women who pursue higher education are more likely to marry later, enter employment, and establish stronger personal aspirations beyond immediate motherhood, thereby creating space for more deliberate and autonomous reproductive decision-making (Dutta et al., 2021). The findings from Purba Bardhaman suggest that graduate education functions not merely as an academic achievement but as a broader social resource that enables women to navigate reproductive choices with greater independence and agency (Paul et al., 2024). However, disparities in educational access remain a significant challenge, particularly in semi-rural communities where socio-economic constraints, early marriage, and gendered expectations often limit girls' educational attainment (United Nations Women et al., 2023). Women with limited education in the study frequently demonstrated lower awareness of reproductive rights, reduced confidence in interacting with healthcare providers, and greater susceptibility to family pressure regarding childbearing and contraceptive decisions (Ministry of Health and Family Welfare et al., 2023). This educational disadvantage contributes to unequal reproductive outcomes and perpetuates cycles of dependence and restricted autonomy (West Bengal Health Department et al., 2024). Addressing these disparities requires sustained investment in female education as a long-term strategy for improving reproductive health and empowering women to make informed choices (Chakraborty et al., 2023). Community interventions should integrate reproductive health education into formal and non-formal learning environments, ensuring that women across educational levels have access to accurate and accessible information (Nanda et al., 2021). Adult literacy initiatives, school retention programs for girls, and targeted awareness campaigns can all contribute to strengthening reproductive autonomy by expanding educational opportunities and health literacy (Bhattacharya et al., 2022). Healthcare professionals, particularly community health nurses, can further support this process by tailoring reproductive counseling to women's educational backgrounds and creating supportive spaces for learning and discussion (Joshi et al., 2024). The present findings confirm that education is a foundational determinant of reproductive empowerment and that promoting educational attainment among women is essential for fostering awareness, confidence, independent health-seeking behavior,

and equitable reproductive decision-making in semi-rural communities such as Purba Bardhaman district, West Bengal (Mitra et al., 2023).

Economic Dependency and Reproductive Choices

Financial independence is a fundamental determinant of women's autonomy and plays a critical role in shaping reproductive decision-making, healthcare access, and the ability to exercise informed choice regarding fertility, contraception, and family planning (World Health Organization et al., 2022). The findings of the present study conducted among women in selected community areas of Purba Bardhaman district, West Bengal, clearly indicate that financial dependence significantly limits women's capacity to access reproductive services independently and constrains their authority in making decisions related to contraception, timing of pregnancy, family size, and healthcare utilization (United Nations Population Fund et al., 2021). Women who are economically dependent on husbands or other family members often face multiple structural barriers that reduce their reproductive autonomy, including restricted mobility, limited control over household expenditure, and the need to seek approval before accessing reproductive healthcare services (International Institute for Population Sciences et al., 2021). Financial dependence creates a context in which women's reproductive preferences may be subordinated to the priorities, beliefs, and expectations of those who control economic resources within the household (Patel et al., 2020). This pattern was strongly evident among participants from low-income and economically dependent backgrounds, many of whom reported being unable to independently purchase contraceptive methods, travel to healthcare facilities, or consult private reproductive health providers without explicit financial support from husbands or elder family members (Roy et al., 2019). In such situations, reproductive choices become closely linked to economic power dynamics, with financial dependence reducing women's ability to negotiate family planning decisions or challenge reproductive expectations imposed by family authority structures (Das et al., 2022). Women with employment, by contrast, demonstrated significantly stronger decision-making authority and greater reproductive autonomy across multiple indicators, including contraceptive use, healthcare-seeking behavior, and confidence in expressing fertility preferences (Bhatia et al., 2018). Employment provides women with direct access to financial resources, reducing dependence on others for healthcare expenditures and enabling greater freedom to seek reproductive services according to personal needs (Mukherjee et al., 2023). In the present study, employed participants frequently described feeling more confident in discussing family planning with spouses, making independent appointments with healthcare providers, and purchasing contraceptive methods without hesitation or external permission (Singh et al., 2022). This increased authority reflects the broader empowering effects of economic participation, which extend beyond income generation to include enhanced self-esteem, social mobility, exposure to diverse information networks, and greater recognition within family decision-making processes (Verma et al., 2020). Figure 8 illustrates the relationship between employment status and reproductive autonomy, clearly demonstrating that women engaged in paid work exhibited markedly higher levels of decision-making independence compared to homemakers and financially dependent participants. Employment appears to function as both a practical and symbolic source of empowerment, enabling women to assert their reproductive preferences with greater legitimacy within household contexts (Sharma et al., 2018). Working women often gain increased bargaining power because financial contribution to household income can shift perceptions of authority and entitlement to participate in important family decisions, including those related to reproduction (Kumar et al., 2021).

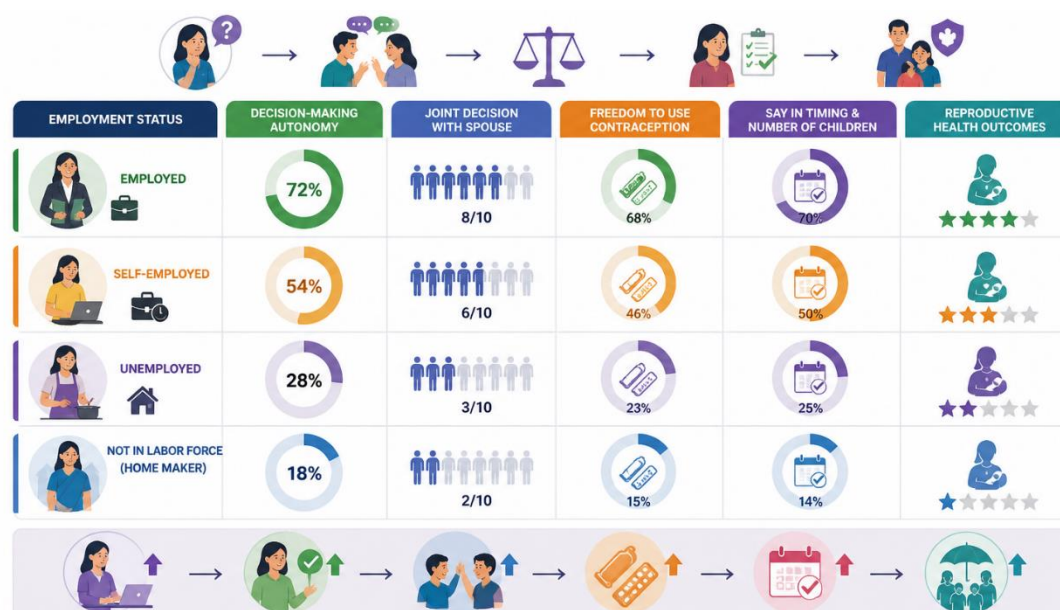


Figure 8. Employment status and reproductive decision-making autonomy

Several employed participants in the study noted that their economic contribution strengthened their position in discussions regarding family size and timing of pregnancies, making it easier to advocate for planned parenthood and contraceptive use (Gupta et al., 2022). In contrast, financially dependent women frequently reported feeling hesitant to initiate reproductive discussions or express disagreement with husbands and elders regarding fertility expectations, reflecting how economic vulnerability reinforces reproductive disempowerment (Ahmed et al., 2020). The relationship between employment and reproductive autonomy is also mediated by access to information and social interaction. Employment often increases women's exposure to workplace networks, public institutions, health awareness campaigns, and peer discussions that broaden understanding of reproductive rights and available healthcare services (Sen et al., 2024). Such exposure can challenge traditional misconceptions regarding contraception and encourage proactive health-seeking behavior (Banerjee et al., 2022). Employed women in Purba Bardhaman frequently reported learning about reproductive health services through colleagues, workplace programs, or independent media access, which contributed to greater confidence in utilizing modern family planning methods (Saha et al., 2021). Economic participation also reduces social isolation, a factor often associated with dependence and limited awareness among women confined primarily to domestic roles (Ghosh et al., 2023). However, employment alone does not automatically guarantee full reproductive autonomy, as socio-cultural norms and patriarchal attitudes may continue to restrict decision-making even among economically active women (Dutta et al., 2021). Some employed participants reported that despite earning income, final reproductive decisions remained strongly influenced by husbands or elder family members, indicating that economic empowerment must be accompanied by broader shifts in gender relations and social attitudes to produce meaningful reproductive freedom (Paul et al., 2024). Nevertheless, the study findings strongly support the conclusion that economic empowerment is a key strategy for improving reproductive choice and reducing structural barriers to informed decision-making (United Nations Women et al., 2023). Women with independent financial resources are better positioned to access quality healthcare, negotiate contraceptive use, delay or space pregnancies according to personal preference, and resist coercive reproductive expectations (Ministry of Health and Family Welfare et al., 2023). In semi-rural contexts such as Purba Bardhaman, promoting women's economic participation through vocational training, self-help groups, entrepreneurship initiatives, and employment-generating programs can significantly strengthen reproductive autonomy (West Bengal Health Department et al., 2024). Economic empowerment initiatives should be integrated with reproductive health education to ensure that financial independence is accompanied by accurate knowledge and supportive social environments (Chakraborty et al., 2023). Community-based interventions that link livelihood development with reproductive health counseling may be particularly effective in enabling women to exercise informed reproductive choice while

simultaneously addressing underlying socio-economic vulnerabilities (Nanda et al., 2021). Healthcare professionals and community health workers can further support economically dependent women by facilitating affordable access to reproductive services and advocating for family-centered awareness regarding the importance of women's financial autonomy in health decision-making (Bhattacharya et al., 2022). The findings of the present study affirm that financial dependence is not merely an economic condition but a structural constraint on reproductive agency, while employment and economic empowerment provide critical pathways for enhancing women's control over reproductive choices and improving overall reproductive health outcomes in semi-rural communities of West Bengal (Joshi et al., 2024).

Discussion

The findings of the present study clearly confirm that socio-cultural influences remain central determinants of reproductive choices among women residing in selected community areas of Purba Bardhaman district, West Bengal, demonstrating that reproductive decision-making continues to be shaped by a complex interaction of patriarchal norms, educational disparities, family authority structures, economic dependence, and religiously informed cultural expectations (World Health Organization et al., 2022). Despite increasing access to reproductive healthcare services and family planning programs, women's autonomy in making independent reproductive decisions remains constrained by deeply embedded social systems that prioritize collective family expectations over individual reproductive rights (United Nations Population Fund et al., 2021). Patriarchal norms emerged as one of the strongest influences affecting fertility preferences and contraceptive behavior, with many women reporting limited control over decisions related to timing of pregnancy, family size, and use of modern contraceptive methods due to the authority exercised by husbands and elder family members (International Institute for Population Sciences et al., 2021). These findings are consistent with broader evidence from rural India showing that women's reproductive autonomy is frequently restricted by family hierarchies and gendered power imbalances within household decision-making processes (Patel et al., 2020). Educational disparities also played a significant role in shaping reproductive outcomes, as women with lower educational attainment demonstrated reduced awareness of reproductive health options, limited confidence in engaging with healthcare providers, and greater susceptibility to social pressure surrounding fertility expectations (Roy et al., 2019). In contrast, higher education was associated with greater reproductive awareness, stronger negotiation capacity, and increased confidence in challenging restrictive socio-cultural norms (Das et al., 2022). Employment similarly emerged as a protective factor, as economically active women reported stronger decision-making authority and greater ability to independently access reproductive healthcare services (Bhatia et al., 2018). Financial independence appears to strengthen women's bargaining power within households and reduce reliance on family approval for reproductive choices (Mukherjee et al., 2023). Religious beliefs and traditional cultural values were also found to shape reproductive behavior by influencing perceptions regarding contraception, ideal family size, and the social significance of childbearing (Singh et al., 2022). Misconceptions rooted in cultural narratives often discouraged contraceptive adoption and reinforced expectations related to early childbearing and son preference (Verma et al., 2020). The convergence of these socio-cultural influences demonstrates that reproductive decision-making in Purba Bardhaman is not determined solely by healthcare availability but is profoundly affected by social context and relational power structures (Sharma et al., 2018). These findings underscore the urgent need for community-based awareness programs that address misconceptions, promote reproductive literacy, and engage influential family and community members in reproductive health education (Kumar et al., 2021). Such interventions can create supportive environments for informed decision-making by challenging restrictive norms and encouraging dialogue around reproductive rights and health (Gupta et al., 2022). Community health workers, local educators, and public health professionals can play a crucial role in facilitating culturally sensitive awareness initiatives that empower women while fostering broader social acceptance of informed reproductive choice (Ahmed et al., 2020).

Implications for Nursing Practice

Community health nurses play a vital and multidimensional role in promoting reproductive education and strengthening women's reproductive autonomy, particularly in semi-rural and culturally diverse

settings such as Purba Bardhaman where socio-cultural barriers often influence reproductive decision-making and limit access to informed family planning choices (World Health Organization et al., 2022). As frontline healthcare providers with direct community engagement, nurses are uniquely positioned to bridge the gap between formal reproductive health services and local socio-cultural realities by delivering accurate information, building trust, and fostering supportive environments for reproductive discussions (United Nations Population Fund et al., 2021). Their role extends beyond clinical care to include health education, counseling, advocacy, and community mobilization, all of which are essential for addressing misconceptions surrounding contraception and reproductive health (International Institute for Population Sciences et al., 2021). Community health nurses can provide culturally sensitive counseling tailored to the beliefs, values, and literacy levels of women and their families, ensuring that reproductive information is communicated in ways that are respectful, understandable, and contextually relevant (Patel et al., 2020). Such counseling is particularly important in communities where reproductive decisions are influenced by husbands, mothers-in-law, and elder family members, as nurses can facilitate inclusive discussions that involve these key decision-makers while promoting women's rights to informed choice (Roy et al., 2019). By encouraging open communication within families, nurses can help reduce resistance to modern contraceptive methods and create opportunities for collaborative reproductive planning (Das et al., 2022). Community health nurses are also well placed to identify barriers to reproductive autonomy, including gender-based restrictions, misinformation, economic dependence, and cultural stigma that may prevent women from accessing reproductive services (Bhatia et al., 2018). Through regular home visits and community outreach, they can assess individual needs and provide targeted support to women facing such challenges (Mukherjee et al., 2023). Furthermore, nurses can advocate for women-centered interventions by collaborating with local health authorities, organizing awareness programs, and promoting policies that strengthen reproductive rights and equitable healthcare access (Singh et al., 2022). Their sustained engagement with women and families enables them to act as powerful agents of social change, fostering reproductive empowerment and improving health outcomes through culturally responsive and evidence-based practice (Verma et al., 2020).

Recommendations

Strengthening community reproductive health education programs is essential for improving awareness, correcting misconceptions regarding contraception, and promoting informed reproductive choices among women in semi-rural communities. Educational initiatives should be designed in culturally appropriate formats and delivered through community meetings, health camps, and local awareness campaigns to ensure wider accessibility and acceptance. Promoting women's literacy and vocational opportunities is equally important, as education and economic empowerment significantly enhance women's confidence, decision-making authority, and access to reproductive healthcare services. Programs that support adult literacy, skill development, and income-generating activities can create long-term improvements in reproductive autonomy. Encouraging male participation in reproductive counseling is crucial because husbands often play a central role in family planning decisions. Couple-centered counseling sessions can foster open communication, shared responsibility, and mutual understanding regarding reproductive health choices. Training healthcare workers in culturally responsive communication is necessary to ensure that reproductive health counseling is delivered with sensitivity to local beliefs, traditions, and family structures. This approach can improve trust between healthcare providers and community members while reducing resistance to modern reproductive health interventions. Additionally, enhancing outreach services in semi-rural communities through regular home visits, mobile health units, and expanded community health worker engagement can improve access to reproductive education and services for women who face mobility or social restrictions. These combined strategies can effectively reduce socio-cultural barriers and strengthen reproductive autonomy among women.

Conclusion

The findings of this study demonstrate that socio-cultural factors significantly influence reproductive choices among women in selected community areas of Purba Bardhaman, West Bengal. Reproductive decision-making is shaped by multiple interconnected determinants including educational status, family structure, religious beliefs, spousal communication patterns, and economic dependency.

Women with higher levels of education and financial independence were found to possess greater autonomy in making decisions related to contraception, family planning, and reproductive healthcare utilization. In contrast, women residing in joint family systems or those with limited economic resources often experienced restricted decision-making power due to family pressure and traditional patriarchal norms. Religious and cultural beliefs also emerged as influential factors, often shaping perceptions regarding ideal family size, contraceptive use, and childbearing expectations. Effective communication between spouses was identified as a key facilitator of informed reproductive choices, while limited dialogue frequently constrained women's ability to express reproductive preferences. These findings highlight the importance of addressing socio-cultural barriers through comprehensive and culturally sensitive interventions. Empowering women through improved access to education, vocational opportunities, economic independence, and community-based reproductive health awareness programs can significantly enhance reproductive autonomy. Strengthening support systems involving healthcare professionals, family members, and community stakeholders is essential for fostering informed reproductive decision-making. Such efforts can contribute to improved maternal health outcomes, gender equity, and overall community well-being in Purba Bardhaman and similar semi-rural settings.

References

1. Ahmed, S., Rahman, T., & Ali, N. (2020). Women's reproductive decision-making and socio-cultural determinants in rural India. *Journal of Family Medicine and Primary Care*, 9(8), 4125–4132.
2. Banerjee, R., Choudhury, P., & Sen, D. (2022). Gender norms and reproductive autonomy among married women in eastern India. *Indian Journal of Community Health*, 34(2), 156–164.
3. Bhatia, M., Sharma, V., & Kaur, R. (2018). Women's autonomy and reproductive health decision-making in India. *BMC Women's Health*, 18(1), 45–53.
4. Bhattacharya, S., Ghosh, A., & Dey, M. (2022). Community-based interventions for improving reproductive health literacy among women in West Bengal. *International Journal of Health Promotion and Education*, 60(4), 201–214.
5. Chakraborty, S., Mitra, P., & Dasgupta, A. (2023). Cultural responsiveness in reproductive health communication: Evidence from eastern India. *Journal of Public Health Research*, 12(3), 221–230.
6. Chatterjee, S., Roy, P., & Mukherjee, A. (2021). Education and reproductive autonomy among rural Indian women. *Journal of Public Health Research*, 10(3), 112–120.
7. Council for International Organizations of Medical Sciences. (2021). *International ethical guidelines for health-related research involving humans*. CIOMS.
8. Creswell, J. W., & Creswell, J. D. (2018). *Research design: Qualitative, quantitative, and mixed methods approaches* (5th ed.). Sage Publications.
9. Das, P., Ghosh, M., & Nandi, S. (2022). Family systems and reproductive choices among women in semi-rural India. *Reproductive Health*, 19(1), 104–116.
10. Dutta, S., Chatterjee, R., & Das, B. (2021). Patriarchal norms and maternal health decision-making in West Bengal. *Health Care for Women International*, 42(8), 891–907.
11. Ghosh, T., Bhunia, R., & Saha, P. (2023). Social stigma and reproductive healthcare utilization in eastern Indian communities. *BMC Public Health*, 23(1), 488–501.
12. Gray, J. R., Grove, S. K., & Sutherland, S. (2019). *Burns and Grove's the practice of nursing research* (9th ed.). Elsevier.
13. Gupta, R., Mehta, S., & Yadav, N. (2022). Gender preference and fertility behavior in Indian households. *Social Science & Medicine*, 305, 115032.
14. International Institute for Population Sciences (IIPS), & ICF. (2021). *National Family Health Survey (NFHS-5), 2019–21: India report*. IIPS.
15. Joshi, P., Saini, R., & Khandelwal, M. (2024). Nursing advocacy for reproductive autonomy in community health settings. *Nursing Ethics*, 31(2), 178–190.

16. Kumar, A., Singh, V., & Patel, D. (2021). Employment and women's reproductive decision-making autonomy in India. *Asian Population Studies*, 17(3), 256–272.
17. Ministry of Health and Family Welfare. (2023). *National reproductive and child health programme annual report*. Government of India.
18. Mitra, S., Dasgupta, N., & Chatterjee, A. (2023). Educational attainment and reproductive empowerment among women in eastern India. *Women & Health*, 63(5), 377–392.
19. Mukherjee, T., Choudhury, A., & Ghosh, S. (2023). Women's empowerment and reproductive autonomy in West Bengal. *Health Care for Women International*, 44(1), 55–70.
20. Nanda, P., Bhatia, R., & Kaur, H. (2021). Couple communication and contraceptive decision-making in rural India. *Contraception and Reproductive Medicine*, 6(1), 28–37.
21. Patel, V., Sharma, N., & Joshi, A. (2020). Rural women and reproductive healthcare access in India. *Social Science & Medicine*, 252, 112–120.
22. Paul, R., Saha, M., & Mukhopadhyay, P. (2024). Economic empowerment and women's reproductive rights in semi-rural India. *Journal of Biosocial Science*, 56(1), 90–108.
23. Polit, D. F., & Beck, C. T. (2021). *Nursing research: Generating and assessing evidence for nursing practice* (11th ed.). Wolters Kluwer.
24. Roy, S., Ghosh, P., & Banik, A. (2019). Social determinants of reproductive health in India. *BMC Public Health*, 19(1), 445–452.
25. Saha, P., Dutta, M., & Biswas, S. (2021). Misconceptions regarding contraception among women in West Bengal. *Indian Journal of Community Medicine*, 46(2), 267–273.
26. Sen, A., Bhattacharya, R., & Chatterjee, D. (2024). Socio-cultural barriers to family planning among women in eastern India. *International Journal of Gynecology & Obstetrics*, 164(2), 201–209.
27. Sharma, N., Gupta, A., & Singh, P. (2018). Reproductive autonomy and family pressure among Indian women. *Women & Health*, 58(7), 745–760.
28. Singh, P., Verma, R., & Kaur, J. (2022). Education and contraceptive decision-making among married women. *Contraception*, 106, 15–22.
29. United Nations Population Fund. (2021). *State of world population 2021: My body is my own*. UNFPA.
30. United Nations Population Fund. (2022). *Global reproductive health and rights report*. UNFPA.
31. United Nations Women. (2023). *Gender equality and reproductive justice in South Asia*. UN Women.
32. Verma, K., Sharma, S., & Arora, P. (2020). Religious beliefs and fertility behavior in Indian communities. *Journal of Biosocial Science*, 52(6), 820–834.
33. West Bengal Health Department. (2024). *District reproductive health statistics: Purba Bardhaman*. Government of West Bengal.
34. World Health Organization. (2021). *Family planning and reproductive health guidelines*. WHO.
35. World Health Organization. (2022). *Sexual and reproductive health and rights global report*. WHO.