

Influence of Opium Consumption and Religiosity on Live Births: A Study of the Singphos in North-East India

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Abstract:

The number of live births plays a crucial role in determining population size; however, this size is also influenced by a variety of socio-economic, cultural and demographic factors. Notably, substance use within a society or culture can significantly and negatively affect live birth rates. These effects are both biological and socio-economic, influencing overall birth outcomes and public health. Among various substances, Opium use is considered a significant factor affecting women's reproductive health, fertility and pregnancy. On the other hand, religiosity is a significant predictor of fertility and independently influences fertility behavior. It is generally associated with lower contraceptive use and higher fertility rates, reflecting an inverse relationship with contraception and a positive relationship with fertility. Thus this paper is an attempt to inquire the influence of Opium consumption and religiosity on live births ever born of the Singphos on the basis of 774 households with married women aged 15 to 45 years from Singpho villages in Assam and Arunachal Pradesh. The study reveals that the average number of birth is 1.7 among Opium user and average number of live births is 2.3 among those higher religiosity women while it is 1.6 among the lower religiosity women.

Keywords: *Opium consumption, religiosity, live births, Singphos, North-East India*

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I. Introduction

The number of live births is a key factor in determining the size of a population; however, population size is also shaped by a range of socio-economic, culture and demographic factors. It is noteworthy that within a society or culture substance use can also adversely influence live births in several significant ways. The effects are both biological (on mother and fetus) and socioeconomic, impacting overall birth outcomes and public health. Among the various substance Opium consumption is considered one of the important determining factors of women reproductive health, fertility and pregnancy. Opium addiction significantly reduces in the function of hypophysis gonadal secretion which leads to infertility (Hejazian, Dashti and Rafati, 2007). Another study revealed that Opium addiction has a lot of pathological effects on spermatogenesis that can cause infertility and low fertility (Morali, Sharamian and Sharafi, 2011). Chronic drug abuse can cause sexual dysfunction and adversely affects the physical, mental and psychological status of the individuals (Khan et al., 2002).

On the other side Religiosity is an important predictor of fertility and has an independent effect on fertility behaviour. There are inverse relationship between religiosity and use of contraception and a positive relationship between religiosity and fertility (Choudhury, 1980).

The Singphos are one of the frontier tribe inhabiting in the states of Assam and Arunachal Pradesh adjoining the Patkai hill in North-East India (Machey, 2018). The existing literature reveals that the Singphos population has been reducing since independence of country although they have a rich legacy and culture. Presently the Singphos are inhabiting in the states of Assam and Arunachal Pradesh of India and in neighbouring countries China and Myanmar. In China they are known as Jingpo and in Burma as Kachin (Machey, 2013). Altogether 7958 Singpho people comprising 3999 males and 3959 females are living in Assam and Arunachal Pradesh as per Census 2011. Large concentrations of this people are in Tinsukia district of Assam and Changlang, Lohit and Namsai districts of Arunachal Pradesh. Moreover, small sizes of the Singpho speaking people are living in Sivasagar, Jorhat, Golaghat and Karbi Anglong districts of Assam (Machey, 2013).

Table: 1
Singpho Population in Assam and Arunachal Pradesh

Census Years	Singpho Population					
	Arunachal Pradesh			Assam		
	Male	Female	Total	Male	Female	Total
2011	2824	2792	5616	1175	1167	2342
2001	2339	2200	4539	NA	NA	NA

Source: Compiled from Census 2001 and Census 2011.

The Singphos are fond of opium consumption. In many families the mothers provide a moaning child with small dose of opium that acts as a sedative. This has an impact on their fertility (Sahu, 2002). Lakhendra (2014) has observed that Opium consumption is a traditional practice among the Singphos that harmed the fertility among the tribesmen.

The Singphos follow the principles of Hinayana Buddhism, while simultaneously maintaining their traditional beliefs and practices.

In this backdrop this paper is an attempt to inquire the influence of Opium consumption and religiosity (here religiosity implies the magnitude of practice of religious principles) on live births ever born of the Singphos.

II. Objectives of the Study

The objective of the study is to inquire the influence of Opium consumption and religiosity on live births of the Singphos in North-East India.

III. Methodology of the Study

The study is based on a field survey comprising 774 households with married women aged 15 to 45 years from Singpho villages in Assam and Arunachal Pradesh. Secondary information is collected from journals, documents and websites.

Religiosity Index

An Individual's commitment towards religion significantly influences the fertility behaviour. The commitment towards religion is known as religiosity. It measures the general intensities of religious practice, religious experience, ideology and the intellectual dimensions. In the present study religiosity is measured in terms of level of religiosity by constructing religiosity index. For construction of religiosity index respondents are categories into three levels according to their religious practice, religious experience, ideology and the intellectual dimensions.

Score for religiosity index - Higher level religiosity score 3, Medium level religiosity score 2 and Lowe level religiosity score 1

IV. Findings of the Study

Opium consumption is a longstanding tradition among the Singphos. Observations suggest that habitual opium use among the Singphos has adversely affected reproductive health and reduced fertility within the community. The table 2 presents the data on opium consumption and the number of live births ever born.

Table: 2
Opium consumption and number of live births ever born

Opium Use	No. of Respondents	Number of live births ever born					Average no. of live birth
		1	2	3	4	Total	
Yes	320 (41.3)	115 (59.3)	338 (39.5)	105 (24.5)	4 (11.1)	562 (37.1)	1.7
No	454 (58.7)	79 (40.7)	518 (60.5)	324 (75.5)	32 (88.9)	953 (62.9)	2.1
Total	774 (100)	194 (100)	856 (100)	429 (100)	36 (100)	1515 (100)	1.9

Source: Field study data

(Percentage in parenthesis)

The Table 2 depicts that out of 774 respondents 41.3 per cent (husband or/and wife) consume Opium and 58.7 do not consume. The data in the table reveals that among the Opium consumer the percentage of birth is

37.1 while it is 62.9 per cent among non-Opium consumer. Moreover, the average number of birth is 1.7 among Opium consumer compared to 2.1 among non-Opium consumer.

The sacred canon of Buddhist teaching and regulation is called the Tripitaka. In India approximately 84 lakhs Buddhist reside who makes up 0.7 per cent of total population of the country. As per latest figures of 2011 census growth rate of Buddhism has fallen down from 22.83 per cent to just 6.1 per cent. In the Asia Pacific region the total fertility rate (TFR) for Buddhists is 1.6 compared with the region overall of 2.1.

Table: 3
Religiosity and number of live births ever born

Religiosity	No. of Respondents	Number of live births ever born					Average no. of live birth
		1	2	3	4	Total	
Higher Level	344 (44.4)	30 (15.5)	386 (45.1)	336 (78.3)	36 (100)	788 (52)	2.3
Medium Level	259 (33.5)	96 (49.5)	292 (34.2)	51 (11.9)	0 (0)	439 (29)	1.7
Lower Level	171 (22.1)	68 (35)	178 (20.7)	42 (9.8)	0 (0)	288 (19)	1.7
Total	774 (100)	194 (100)	856 (100)	429 (100)	36 (100)	1515 (100)	1.9

Source: Field study data

(Percentage in parenthesis)

The Table 3 depicts that the percentage of live births ever born is highest (52.5) among the women with higher religiosity (44.7 per cent) than those women with lower religiosity (55.3 per cent). It is observed that the average number of live births is 2.3 among those higher religiosity women while it is 1.6 among the lower religiosity women. Therefore it can be said that there is strong positive correlation between religiosity and number of life births ever born among the Singphos.

V. Conclusion

The above analysis indicates that low levels of religiosity are associated with a reduction in the number of live births, and that opium consumption has a significant negative effect on the average size of live births. Therefore, it is recommended that the Singpho community remain mindful of their population trends and take timely measures to address these issues.

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