EXCLUSIVE BREASTFEEDING AND FAMILY INFLUENCES IN RURAL GHANA: A QUALITATIVE STUDY

IDDRISU SEIDU

Supervisor: Ronald Stade
ABSTRACT

Exclusive breastfeeding has been recognised as an important public health tool for the primary prevention of child morbidity and mortality. Consequently, the WHO and UNICEF have recommended exclusive breastfeeding for the first six months after delivery, followed by introduction of complementary foods and continued breastfeeding for 24 months or more. Even so, however, efforts to promote exclusive breastfeeding have either achieved limited successes or run into severe problems due in part to poor understanding of the several influences on the practice. As a social institution and more importantly the basic unit of society, the aim of this study was to seek an in-depth understanding of family influences on exclusive breastfeeding in rural Ghana. Using a qualitative method with unstructured interviews as data collection instrument, a total of fourteen respondents comprising breastfeeding women and family from Moglaa in the Savelugu/Nanton Municipality in Ghana participated in this study. All Interviews were audio taped, transcribed, and analysed using seven analytic procedures. Four themes emerged in relation to the forms of family influences on exclusive breastfeeding: family knowledge of exclusive breastfeeding; collective sense of duty; family beliefs and practices; and learning to breastfeed. Given how the family participate and influence infant feeding practices, it is suggested that public health education must aim at increasing the familiarity of family members on breastfeeding recommendations and also endeavour to work with traditional and religious leaders so as to modify and/or discourage practices that involve feeding newborns with herbal teas and ritual concoctions.

Key words: Exclusive breastfeeding, family, Ghana, influence, rural community
# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>ABSTRACT</td>
<td>1</td>
</tr>
<tr>
<td>ABBREVIATIONS</td>
<td>4</td>
</tr>
<tr>
<td>DEFINITIONS</td>
<td>5</td>
</tr>
<tr>
<td><strong>Chapter One</strong></td>
<td></td>
</tr>
<tr>
<td>INTRODUCTION AND BACKGROUND</td>
<td>6</td>
</tr>
<tr>
<td>1.1 Introduction</td>
<td>6</td>
</tr>
<tr>
<td>1.2 Background</td>
<td>7</td>
</tr>
<tr>
<td>1.2.1 Breastfeeding in historical context</td>
<td>7</td>
</tr>
<tr>
<td>1.2.2 Exclusive breastfeeding trends in the developing world</td>
<td>9</td>
</tr>
<tr>
<td>1.2.3 Health benefits of exclusive breastfeeding</td>
<td>10</td>
</tr>
<tr>
<td>1.2.4 Breastfeeding practices in Ghana</td>
<td>11</td>
</tr>
<tr>
<td>1.2.5 The Ghana context</td>
<td>12</td>
</tr>
<tr>
<td>1.2.5.1 Family structure</td>
<td>12</td>
</tr>
<tr>
<td>1.2.5.2 Geography</td>
<td>13</td>
</tr>
<tr>
<td>1.2.5.3 Demographic profile</td>
<td>14</td>
</tr>
<tr>
<td>1.2.5.4 Infant and child health</td>
<td>15</td>
</tr>
<tr>
<td>1.2.5.5 Infant nutrition in Ghana</td>
<td>16</td>
</tr>
<tr>
<td>1.3 Primary scientific problem</td>
<td>17</td>
</tr>
<tr>
<td>1.4 Aim of the study</td>
<td>17</td>
</tr>
<tr>
<td>1.5 Research questions</td>
<td>17</td>
</tr>
<tr>
<td>1.6 Significance of the study</td>
<td>17</td>
</tr>
<tr>
<td><strong>Chapter Two</strong></td>
<td></td>
</tr>
<tr>
<td>PREVIOUS RESEARCH ON EXCLUSIVE BREASTFEEDING</td>
<td>19</td>
</tr>
<tr>
<td>2.1 Determinants of exclusive breastfeeding</td>
<td>19</td>
</tr>
<tr>
<td>2.2 Pre breastfeeding practices</td>
<td>20</td>
</tr>
<tr>
<td>2.3 Influences on breastfeeding</td>
<td>21</td>
</tr>
<tr>
<td>2.4 Weaning and the weanling’s dilemma</td>
<td>22</td>
</tr>
<tr>
<td>2.5 Delimitation of study</td>
<td>24</td>
</tr>
<tr>
<td><strong>Chapter Three</strong></td>
<td></td>
</tr>
<tr>
<td>METHOD</td>
<td>25</td>
</tr>
<tr>
<td>3.1 Selecting the study area and why?</td>
<td>25</td>
</tr>
</tbody>
</table>
Chapter Four

RESULTS ................................................................. 34

4.1 Demographic characteristics of participants ......................... 34

4.2 Four Themes ...................................................... 34

4.2.1 Family knowledge of breastfeeding .................................. 33

4.2.2 Collective sense of duty .............................................. 36

4.2.3 Family beliefs and practices ......................................... 37

4.2.4 Learning to breastfeed ................................................. 39

4.3 Discussion of results .................................................. 41

4.4 Implications for public health policy .................................... 45

Conclusion ........................................................................ 46

Acknowledgements .......................................................... 48

References ........................................................................ 49

Appendixes ........................................................................ 56
ABBREVIATIONS
EBF:   Exclusive breastfeeding
EAF:   Exclusive Artificial Feeding
GDHS:  Ghana Demographic and Health Survey
GSS:   Ghana Statistical Service
HIV:   Human Immunodeficiency Virus
MDG:   Millennium Development Goals
UNICEF: United Nations Children’s Fund
WHO:   World Health Organization
DEFINITIONS

*Colostrum:* Colostrum is the first fluid that comes from the breast immediately after birth. It is yellowish in colour and contains high protein and antibodies. It is often described as the first form of ‘immunization’ for a new born child.

*Exclusive breastfeeding:* refers to when infants are not given any other food or liquid including water during the first six months after delivery.

*Exclusive artificial feeding:* a feeding method that solely involves the use of none breast milk foods.

*Neonate:* refers to a new born baby especially one that is less than one month old.

*Lactational amenorrhea:* it is a natural form of birth control mechanism or protection against pregnancy that occurs during breastfeeding. The effect is observed to be particularly strong when breastfeeding is exclusive.

*Otitis media:* an infection involving the middle ear that is common among infants but is not limited to them.

*Prelacteal feeds:* Prelacteal feeds are fluids given to newborns before breastfeeding is initiated.

*Postpartum:* the immediate period after child birth especially the first 6 weeks

*Stunting:* it is also referred to as ‘shortness’. It is a condition characterised by low height for age that is caused by insufficient nutrition over a long period and regular infections.

*Wasting:* this is also known as ‘thinness’. It is a condition characterised by low weight for height that is caused by acute food shortage.

*Weaning:* this refers to a practice in the course of breastfeeding during which infants are gradually introduced to non breast milk foods and thereby leading to cessation of breastfeeding.

*Wet nurse:* a woman who breastfeeds another woman’s baby. In addition to the feeding, a wet nurse may also be tasked to take care of the baby usually for a fee.
Chapter One
INTRODUCTION AND BACKGROUND

1.1 Introduction
Over the last couple of decades, there has been an increasing interest in the promotion of exclusive breastfeeding as the ‘best’ feeding method for newborns. This, to a large extent, has been inspired by mounting scientific evidence on the importance of exclusive breastfeeding in reducing infant morbidity and mortality. In resource limited settings where poor and sub-optimal breastfeeding practices frequently result to child malnutrition which is a major cause of more than half of all child deaths (Sokol et al. 2007), exclusive breastfeeding is regarded as imperative for infants’ survival. Indeed, of the 6.9 million under five children who were reported dead globally in 2011, an estimated 1 million lives could have been saved by simple and accessible practices such as exclusive breastfeeding (WHO, 2012). Consequently, the WHO and UNICEF (1990) have recommended exclusive breastfeeding for six months, followed by introduction of complementary foods and continued breastfeeding for 24 months or more.

In Ghana, an estimated 84% of children younger than 2 months are being exclusively breastfed. By age 4 to 5 months, however, only 49% continue to receive exclusive breastfeeding (Ghana Statistical Service & ICF Macro, 2009 p. 187). In order to understand the dynamics of the practice, several studies have been conducted in Ghana and in many parts of the world. Much of these studies have focused on factors and barriers to exclusive breastfeeding (Aidam et al. 2005; Otoo et al. 2009; Senarath et al. 2010). Some too have looked at the health outcomes of exclusive and non exclusive breastfeeding (Duncan et al. 2009; Coutsoudis et al.1999; Kramer, 2003); while others have also studied the potential role of husbands in breastfeeding decisions (Arora et al.2000; Susin, et al. 2008). Much less attempts however, have been made at investigating how the family might influence exclusive breastfeeding practices especially in sub Saharan Africa. This thesis is thus an endeavour to meet the current knowledge gaps.
1.2 Background

1.2.1 The historical context of breastfeeding

Humans and apes (all hominoids) have had similar defining features of their reproductive physiology including lactation and breastfeeding throughout history (Kennedy, 2005); yet detailed anthropologic work on ancient breastfeeding practices and patterns has rather been scanty (Sellen, 2009), a dearth that is partly blamed on the male-centred perspectives that focus primarily on male activities to the neglect of female related ones such as breastfeeding and child birth (Stuart-Macadam and Dettwyler, 1995). Even so, however, breastfeeding has been reported as an age-old practice that has been very critical not only to the physiology, growth, and overall well-being of neonates but the physiology and health of women as well (Stuart-Macadam and Dettwyler, 1995). Indeed, scarcely does a society exist without some form of infant breastfeeding; for it is one of the practices among human societies that transcend the boundaries of time and place. The practice has been a method of feeding to which infants have not only adapted but lived on for most of human existence on earth (ibid). It was also in the course of several centuries, significantly practiced, respected, and the primary attractor of many artistic works such as paintings, drawing, and sculptures (Tonz, 2000; Sellen, 2009).

In many ancient societies, breastfeeding practices were often guided by traditions, ancient medical literatures etc. For instance, the Susruta, an ancient Indian medical text recommended that "in the six month of its birth the child should be fed on light and wholesome rice" (Fildes, 1986 p.16). Similar ancient medical texts such as the Ayurvedic stipulated the use of breast milk as the sole food for babies until the end of the first year (ibid). Besides, early religious scriptures such as the Bible and the Quran also had and still have some recommendations on breastfeeding practices. In Isaiah chapter 66 verse 11, it is mentioned ‘that ye may suck, and be satisfy with the breast of her consolations; that ye may milk out and be delighted with the abundance of her glory’ (Bible, the book of Isaiah 66:11). The Quran similarly stipulates that ‘the mothers shall give suck to their children for two whole years, (that is) for those parents who desire to complete the term of suckling…… And if you decide on a foster suckling-mother, there is no sin on you, provided you pay the mother what you agreed on reasonable basis’ (Quran 2:233). Indeed, until the 19th century, breastfeeding was the norm in virtually all human societies; and almost every child was breastfed regardless of socio-cultural environment and economic status (Soko et al. 2007). Even when mothers were not in a position to breastfeed owing to sickness, death, etc other women were made to breastfeed the newborn. Over time, these women, called wet nurses became readily and widely available for breastfeeding services especially for affluent families. According to Stevens, Patrick and
Pickler (2009) the emergence of wet nursing in human societies first served an ‘alternative of need’ e.g. during sickness, and later an ‘alternative of choice’ e.g. when it became commercialized. In Europe for instance, wet nursing became a lucrative employment and had been the dominant form of infant feeding from early 15th century to mid – 18th century (Grieco and Corsini, 1991). By late 16th to early 17th century, concerns about wet nursing had grown; and calls for mothers to breastfeed their own babies were being supported by leading authorities like Jacques Guillemeau, a French Obstetrician (Stevens, Patrick and Pickler, 2009). Puritan theologians were also noted to have dedicated sermons and even tracts of behaviour books to criticism of women who failed to breastfeed their own babies (Fildes, 1986). In spite of the disapproval and growing rejection of wet nurses’ services, the practice however, persevered until the 18th and 19th centuries (ibid).

In the 19th century, Justus Von Liebig, a German chemist invented was one of the first breast milk substitutes. Not long after him, Henri Nestle, another German scientist, as well invented ‘farine lactee’ (wheat flour with milk) on his arrival in Switzerland in 1843 (Palmer, 2009). Nestle’s new found milk quickly flourished and by 1873, an estimated 500,000 boxes of farine lactee was sold each year throughout Europe, USA, Mexico, Argentina, and the Dutch East Indies (ibid p.206). Beginning with the affluent and then poor working mothers, the use of breast milk substitute became widespread on the heels of intensive advertisements and closed collaboration with medical practitioners. As a consequence, many mothers were commonly diagnosed with ‘breast milk insufficiency syndrome’ and then asked to cease breastfeeding (Avishai, 2009). Almost immediately, breastfeeding rates plummeted throughout Europe and North America as commercial milk gained dominance from late 19th century to much of the 20th century. It is instructive to note that while wet nursing coexisted and provided alternative to maternal breastfeeding with little or no harm, the invention of modern breast milk substitute by contrast, undermined and disturbed the bond between infants and the very act by means of which they subsisted for centuries.

Perhaps, one of the things for which early breast milk substitutes would continue to be remembered is the soaring infant mortality that attended to its use. Countless number of the artificially fed infants suffered from infectious diseases e.g. diarrhoea and died more often than their breastfed counterparts. In the southern part of Germany where infants were customarily fed with a mixture of flour, water and animal milk, infant mortality skyrocketed to 400 deaths per 1000 live births, a proportion that was four times the mortality rate in Norway (Palmer, 2009 p.178). Around the early part of the 20th century however, rising concerns about the risk of commercial infant milk led in part, to improvements in artificial milk. Sterilization, hygienic
storage facilities, and knowledge about the energy requirements for infants made breast milk substitutes a relatively safer alternative (Crowther, Reynolds and Tansey, 2009). But even so, artificially fed babies bore substantial risk of morbidities and deaths compared with the breastfed ones. In Boston for instance, a study in 1910 reported a six fold likelihood of death among artificially fed babies than the breastfed ones (Palmer, 2009).

1.2.2 Exclusive breastfeeding trends in the developing world
In recognition of the essential role of exclusive breastfeeding (hereinafter referred to as EBF) vis-à-vis infants' survival strategies, a lot of effort has gone into scaling up the rates in developing countries where incidence of child malnutrition and mortality is still high. Yet, successes in increasing the levels of EBF have rather been modest. In an analysis of data on EBF from 38 developing countries between 1990 and 2000 Labook et al. (2006) reported an increase EBF rate from 46% to 53% among infants younger than 4 months and from 34% to 39% for those younger than 6 months. Higher increment was noted in urban areas (30% to 46%) than rural ones (42% to 48%). Although there were increases in all the regions studied viz. Middle East/ North Africa (29% to 34%), South Asia (49% to 56%), East Asia/Pacific (57% to 65%); the most impressive increment, however, was found in Sub Sahara Africa where the rate nearly doubled from 18% in 1990 to 38% in 2000 (p. 275).

Recent analysis by Cai, Wardlaw and Brown (2010) on the global prevalence of EBF across 140 countries, also reported an increase in the developing world from 33% in 1995 to 39% in 2010 among infants aged 0 - 5 months. Increases from West and Central Africa were more than twofold i.e. from 12% in 1995 to 28% in 2010. There had also been considerable improvements from 35% in 1995 to 47% in 2010 among countries in Eastern and Southern Africa whereas those in South Asia witnessed a modest surge from 40% in 1995 to 45% in 2010. Though it is still lower than the other regions, the rapid increase in West and Central Africa is probably not a surprise since it hitherto had and continues to have one of the lowest rates of EBF in the developing world for which reason intensive efforts were made to scale up the practice in the last two decades. Although the rates of EBF for the past two decades have been increasing, it is certainly clear nevertheless that the road to a world wherein 90% coverage of EBF will be reached remains a demanding task. This is evident in the current low prevalence in much of the developing world especially in West and Central Africa which happens to have one of the highest rates of malnutrition in the world (Sokol et al., 2007). While causal declarations about the modest successes that have been achieved throughout the 1990s and early part of the 21st century are quite difficult to make, some (Labbok et al. 2006)
however, have linked the observe improvements in EBF rates to the efficacies of global and national policy efforts in the 1980s e.g. International Code of Marketing of Breast milk Substitute, Hospital and Baby Friendly Initiative etc.

1.2.3 Health benefits of exclusive breastfeeding

Breastfeeding served and continues to serve as an appropriate method through which newborns are offered essential nutrients necessary for optimal growth and intellectual development. Breast milk is regarded as perfect, natural and protective food for newborns. Given that prolonging people’s lives (by reducing mortality) and preventing disease (by reducing morbidity) are some of the goals of public health (Brulde, 2011), breastfeeding and/or EBF has been acknowledged as an effective approach to the achievement of these goals. In a study by Vennemann and colleagues (2009) breastfeeding was found to be protective against sudden infant death syndrome by reducing the risk by 50% at all ages during infancy; these benefits have been reported to exhibit dose-response relationship, that is, health gains increases with increases in duration and exclusivity.

Infants when exclusively breastfed for the optimal duration of six months are significantly protected against the major childhood diseases conditions viz. diarrhoea, gastrointestinal tract infection, allergic diseases, diabetes, obesity, childhood leukaemia and lymphoma, inflammatory and bowel disease (WHO, 2012; American Academy of Pediatrics, 2012). In particular, the risk of hospitalization for lower respiratory tract infections during the first year of life is reduced by 72% when infants are exclusively breastfed for more than 4

![Figure 1 Trends in EBF among infants younger than 6 months](image)

Source: Adapted from Cai, Wardlaw and Brown (2012 p.4)
months (American Academy of Pediatrics, 2012, p. 828). Duncan et al (2009, p. 867) also found exclusive breastfeeding to be protective against single and recurrent incidences of otitis media. Infants who were given supplementary foods prior to 4 months had 40% more episodes of otitis media than their counterparts.

In the developing world where access to antiviral drugs for HIV infected women is still difficult, exclusive breastfeeding will be helpful in minimizing HIV-1 transmissions; this was found in a prospective study of 549 HIV infected breastfeeding mothers in South Africa by Couttsoudis and colleagues (1999). After adjusting for possible confounders, the researchers found a significantly lower risk of HIV-1 transmission in children who were exclusively breastfed for up to 3 months in contrast with those who had complementary feeding prior to 3 months. Mothers who exclusively breastfeed their children also enjoy an advantage of prolong lactational amenorrhoea (WHO, 2001). The risk of breast and ovarian cancer among breastfeeding women is also lower than those who use infant formula (WHO, 1990).

1.2.4 Breastfeeding practices in Ghana

Unlike EBF, breastfeeding per se is generally not a problem in Ghana. This is evidenced by the fact that as high as 98% of all infants younger than six months are being breastfed; and even at age 12 - 15 months, 95% of children continue to receive breast milk along with complementary foods. EBF on the other hand is short lived with an estimated 84% of children younger than 2 months being exclusively breastfed. Although initially higher, the percentage of children who continue to receive exclusive breastfeeding by age 4 to 5 months plummets to about 49% (Ghana Statistical Service & ICF Macro, 2009 p.186 - 188). On the whole, the use of colostrums has become common while early initiation of breastfeeding is improving. In particular, children domiciled in urban areas (55%) are likely to be breastfed within the first hour after delivery in contrast with children in rural areas (50%). Average duration of breastfeeding however, is a bit higher among children in rural areas (21 months), compared with 19 months for those in urban areas.

Unlike countries such as Namibia, Nigeria, Tunisia, and Sudan, where the rate of bottle-feeding is as high as 30% (Sante Mont rouge, France), the proportion of bottle-fed infants in Ghana is estimated at 5% among infants younger than 2 months and 21% among those aged 6-8 months (GSS & ICF Macro p,188). At about six months of age and beyond an estimated 68% of Ghanaian breastfeeding children are given both solid and semisolid foods. Most of these complementary foods are made from grains, meat, egg, fish, fruits, and vegetables (ibid). A general picture of these practices is illustrated in figure 2 below.
1.2.5 The Ghana context

1.2.5.1 Family structure

As the most basic nucleus of society, the institution of family has been ubiquitous throughout past and present human societies; yet its conception and structural arrangement have varied significantly from one group of people to another. A unanimous definition of family is therefore difficult to find. McMurray (2003) describes family as a mediating structure which serves as a link between individuals and the society in which they live, and through which the society’s norms, values, roles, and responsibilities are transmitted (p.226). In traditional Ghanaian societies as it is in many parts of sub Saharan Africa, the institution of family is conventionally conceived in term of its core functions e.g. child birth, kinship ties etc.

Families in Ghana are either nuclear (family of procreation) or extended (family of orientation). The former consist of husband, wife, and their children living in a rented apartment, or in some cases their own house. It is progressively becoming the common and favored type of family system in many cities due perhaps to urbanization and its demand for smaller family sizes. The latter on the other hand, comprises grandparents, fathers, mothers, uncles, aunts, cousins, and children. This type of family system is predominantly found in rural
or less urbanized parts of the country where people are more of a social group, that is, they identify with one another, have shared experiences, strong solidarity, and more importantly regular interaction.

It is important to note that, the continues existence of the extended family system despite considerable social changes occasioned by formal education, economic conditions, migration, and the globalization of western culture, cannot be attributed to chance but to a number of important roles it performs. In Ghana where state sponsored social welfare services are nonexistent, the extended family arrangement provides economic and emotional insurances especially for the vulnerable ones viz. the elderly and children (Nukunya, 2003). The elderly for instance take care of grand children while the young adults engage in economic activities to provide for their needs and for the rest of the family. As a social organization wherein care, protection, and emotional affection are expressed to new members, this type of family arrangement provides a bigger platform for socializing children into the family and community as a whole.

Despite the fact that there are many ethnic groups\(^1\) in Ghana, viz. Akan (47.5%), Mole Dagomba (16.6%), Ewe (13.9%), and Ga Dagme (7.4%) (Ghana Statistical Service, 2010 p.5), with some linguistic and cultural variations, certain family rituals are nonetheless similar. A case in point is families’ practices on a neonate. A newly born Ghanaian child is customarily kept indoors for a period of seven days for the reason that (1) the child is vulnerable to both physical and spiritual harm (2) he/she is seen as a guest from the spiritual realm that may go back during the first week. Surviving children are thus named on the 7\(^{th}\) day amidst colorful traditional ceremony to formally welcome and sanction the child’s membership to the family. These ceremonies, called in the local parlance kpodziemo among the Ga, suuna among the Dagomba, abadinto or dzinto among the Akan, and vihehedego among the Ewe (Salm and Falola, 2002) are performed by all the different groups.

1.2.5.2 Geography

Located in West Africa, Ghana is bordered with Togo to the east, Burkina Faso to the north, Ivory Coast to the west, and the Gulf of Guinea to the south. It covers an area of about 238,538 square kilometers. The climate is tropical with both wet and dry seasons. The northern part of the country has one rainy season that extends from March to November whereas the southern half experiences two rainy seasons beginning from April to July and from September to

\(^1\) Those mentioned above are the major ethnic groups in Ghana. The rests include: Gurma (5.7%), Guan (3.7%), Grusi (2.5%), Mande (1.1%), and others (1.4%) (Ghana Statistical Service, 2010 p.34)
November (David, 2009). For administrative purposes, the country is divided into 10 regions viz. Ashanti, Brong Ahafo, Central, Eastern, Greater Accra, Northern, Upper East, Upper West, Volta, and Western regions; each comprising several districts. In total there are presently 212 districts in the country.

**Figure 3 Map of Ghana**


### 1.2.5.3 Demographic profile

Ghana is home to about 24.6 million people with an annual growth rate of 2.5%. The population density as of 2010 was 103 persons per square kilometer representing an increase of 30.4% from 79 persons per square kilometer in the year 2000 (Ghana Statistical Service, 2012). Northern region is the most sparsely populated with about 35 persons per square kilometer whiles Greater Accra region, host of the capital city is the most densely populated with 1,236
persons per square kilometer (ibid). The percentage of male population is 48.7 in contrast with 51.2 for females. Ghana’s population continues to be youthful with a greater proportion (38.3%) being children below 15 years, a trend that can be understood partly by the relative high fertility and declining child mortality due to improvement in public health. Elderly people aged 65 and above are less visible as they constitute 4.6% of the population. Total fertility rate in Ghana has been on decline over the past two decades. The rate plummeted from 6.4 per woman in 1988 to 4.4 in 1998 and to 4.0 per woman in 2008 (GSS and IFC Macro, 2009).

**Figure 4 Age structure of Ghana’s population**

Source: adapted from Ghana Statistical Service 2012

### 1.2.5.4 Infant and child health

An estimate of infant and child mortality is one of the basic indicators of health, nutrition, and quality of life in any given country. In Ghana concerted efforts (mainly by government and nongovernmental organizations) over the past two decades have led to significant reductions in mortalities rates. Child mortality rate has decreased from 122 deaths per 1000 live births in 1990 to 74 deaths per 1000 live births in 2010. Over the same period, infant mortality rate also
reduced from 77 deaths to 50 deaths per 1000 live births (Unicef et al.2011). While these reductions have been substantial and promising, a great deal of commitment nonetheless still needs to be made in order to achieve the target of Millennium Development Goal (hereinafter referred to as MDG) 4 i.e. from 122 deaths in 1990 to 41 deaths per 1000 live births by 2015 (ibid). Like many other health indicators, rates of child and infant mortality in Ghana are unequally distributed along regional, rural/urban, socioeconomic status and education. Infant mortality for instance stands as low as 36 deaths in Greater region to as high as 97 deaths per 1000 live births in Upper West region (GSS and IFC Macro, 2009). Similar variations exist in under five death rates between mothers with no education (102 deaths per 1000 live births) and those with basic education (68 deaths per 1000 live births).

1.2.5.5 Infant nutrition in Ghana

Contemporary pages of post independent history of Ghana are replete with government policies on nutrition. Gharty (2010 p.15) classifies these policies into six phases: the period of food demonstration and nutrition education (1957 - 1966); continuation of food demonstration and transition into identifying attitude and behavior change (1966 - 1974); the period of weaning and supplementary foods (1974 - 1987); addressing micronutrient requirements (1987 - 1990); planning and mobilizing for action: addressing micronutrient deficiencies and exclusive breastfeeding (1990 - 2000); and consolidation of strategies for addressing micronutrient deficiencies, exclusive breastfeeding and community-based growth monitoring (2000 - 2008). It is worthy of note that the changing policy focus from one period to another was often informed by prevailing local or national need and more importantly, influences from development partners (ibid).

Even with all these policies however, malnutrition among Ghanaian children who constitute a greater part of the population remains high. Recent anthropometric (measurement of human body) data from the 2008 Ghana Demographic and Health Survey report indicate that 28% of all under five children are stunted (chronic malnutrition) and 40% of the cases involve children age 18-23 months. Children in rural areas (32%) are more likely to be stunted than in urban areas (21%). The report similarly estimated those who are wasted at 9% (acute malnutrition) whereas underweight children (combination of chronic and acute malnutrition) are 14% (GSS and IFC Macro, 2009 p. 182). Inappropriate feeding practices coupled with frequent episodes of infectious illnesses are primarily the causes of malnutrition. Given the established relationship between malnutrition and a range of adverse health outcomes viz. child mortality, slowed growth, impaired learning abilities (Unicef, 2009) etc. the need for improved
and sustained efforts at combating the condition is not only critical for improvements in child’s health but central to the achievement of three of the eight MDGs namely elimination of hunger (MDG1), reduction in child mortality (MDG4), and reduction in maternal mortality (MDG5).

1.3 Primary scientific problem
That infants below 6 months of age have not yet fully developed to make use of other foods besides breast milk has been well established among Public Health scientists; hence the recommendation for EBF for all children under six months old. Even so, however, efforts to promote EBF have either in most cases achieved less than desired outcomes or run into severe problems. One contributory factor to such outcomes is that public health interventions more often than not are tailored to meet the individual needs of breastfeeding mothers without taking into account the wider impact of family influence on behaviour and decision making. This perhaps is conceivable given the poor understanding of family influences on infant feeding particularly in rural areas. An in-depth understanding of family structures in rural communities is thus central to the development of comprehensive approaches to health interventions and education services in Ghana.

1.4 Aim of the study
The aim of this study was to understand and explain the influences of family on exclusive breastfeeding practices in rural Ghana.

1.5 Research questions
- How do family members define and participate in infant feeding practices?
- What are the forms of family belief systems that shape infant feeding during the first six months after birth and why do they exist?
- How is the rural family organized and how does it influence exclusive breastfeeding practices?
- How do breastfeeding mothers come to acquire knowledge about breastfeeding?

1.6 Significance of the study
Goal four of the eight Millennium Development Goals is entirely devoted to reducing child mortality by two-thirds between 1990 and 2015; with less than 2 years to 2015, however, progress in many Africa countries is insufficient in achieving this goal. Poor feeding practices such as sub-optimal breastfeeding is still widespread and often leads to malnutrition which is a major cause of more than half of all child deaths (Sokol et al. 2007). By studying and bringing
out the influences of family on breastfeeding practices to the fore, this study will be salutary; as it will contribute to a better understanding of how essential health interventions with proven empirical efficacy such as EBF can be promoted. It is also hoped that this study’s outcome will contribute to the growing body of scientific knowledge on infant feeding practices and how to design and situate health interventions in rural communities. Moreover, this research will in no doubt serve as a basis for future research.
Chapter Two
PREVIOUS RESEARCH ON EXCLUSIVE BREASTFEEDING

2.1. Determinants of Exclusive Breastfeeding

Determinants of EBF are the factors or conditions that might lead to some changes in the practice by for instance encourage or impede it. The extent to which these determinants or factors affect EBF is fairly complex and varies from one country to another and/or between different groups in the same country. Some are biological and beyond women’s control (e.g. Breast engorgement, nipple problems etc.) while others are combinations of economic, environmental, cultural, social etc. Albeit with quantitative approaches, several of these determinants have been extensively studied and documented in recent years.

In a research to examine the perceive incentives and barriers to EBF among pre-urban Ghanaian women, Otoo, Larty and Perez-Escamilla (2009) found supposed milk insufficiency, family pressure, breast and nipple problems, and maternal employment as barriers to EBF. The risk of diseases resulting from poor sanitation, readily availability of breast milk after birth and the high cost of infant formula were also inter alia identified as motivations to EBF. An earlier study by Perez-Escamilla, et al. (1995) in three Latin American countries (Brazil, Honduras and Mexico) also revealed that lower socioeconomic status (in Honduras and Mexico), prior planning on EBF duration (in all the 3 countries), maternal unemployment (in Brazil and Honduras), hospital delivery facilities that had breastfeeding promotion services, and having a baby girl (in Brazil and Honduras) were all positively associated with EBF. In a similar study to assess factors associated with EBF in Accra, Ghana, Aidam and colleagues (2005) too reported delivery at hospital/polyclinic, prior intention or planned EBF at birth, higher education, socioeconomic status, and positive attitudes towards EBF as the most essential support factors for EBF (P.793).

Further research in Mazabuka of Southern Zambia by Fjeld et al. (2008) similarly found feelings of breast milk inadequacy, perception of ‘bad milk’, limited knowledge about EBF, and conventional family expectations as obstructions to EBF. Indeed, several other researchers (Senerath, Dibley and Agbo, 2010; Arora, Mcjunkin, Wehrer and Kuhn, 2000; Alemayehu, Haidar and Habte, 2009) have also linked the practice of EBF to factors similar to the aforesaid. Whereas some of the aforementioned determinants have been consistently recognized as barriers to EBF (e.g. perception of milk insufficiency, maternal employment, inadequate knowledge etc.), others have been less straight forward. For instance, the connection between breastfeeding mothers’ level of education and desirable or undesirable breastfeeding practices has been wavering from one study to another and in some cases from
one form of behaviour to another in the same study. Educated mothers in Western Uganda for example were on one hand, more inclined to use prelacteal feeds; and yet on the other hand were also likely to prepare nutritionally good complementary food for their children (Wamani et al. 2005). The difficulty in relation to education’s role in this instance is whether education enhances one’s cooking abilities or it is increased incomes resulting from education that occasions one’s ability to prepare good complementary foods. In the work by Okolo, Adewunimi, and Okonji (1999), mothers with some form of education e.g. post primary (97.8%) and elementary (93%) were more likely than those with no education (2.5%) to feed their babies with colostrums (p.324). Similarly, studies that have identified socioeconomic status as a determinant of EBF are as well inconsistent and appear to be tentative or relevant to the specific study areas; high socioeconomic status for instance was found to be an enabling factor for EBF in Ghana by Aidam et al. (2005) while the reverse was found from the Latin America study by Perez-Escamilla et al (1995). Additional research on the role of these less straightforward determinants will thus be useful.

It appears to suggest at least from the cited findings that the determinants of EBF are numerous and many of them as demonstrated above are frequently reported in different parts of the world. All the same, it is plausible to think that success rates in Public health interventions that are designed to promote EBF will improve if a broad-spectrum of these determinants is taken into account.

2.2 Pre-breastfeeding practices
Early initiation of breastfeeding especially within the first hour after birth is of fundamental importance to the processes of lactation and for that matter the success of breastfeeding of any kind. That is, frequency of suckling and its duration are key determinants to how much milk is produced and to some extent, the nutrient content of the milk (Quandt, 1995). Therefore, the more the frequency and duration of suckling increases, the greater the quantity of milk that is produce and the converse is true (ibid). For this and several other reasons e.g. vulnerability to infections, the use of prelacteal feeds\(^2\) which is shown to cause delay in early initiation of breastfeeding is discouraged unless medically sanctioned. The practice however, is very widespread and neonates are frequently offered varied combinations of fluids including herbs prior to initiation of breastfeeding.

Among health care workers in Kaduna township, Nigeria, Akuse and Obinya, (2002) reported that prelacteal feeds are given for variety of reasons: nurses are more prone to give it on account of perceived insufficient production of breast milk, for doctors, prelacteal feeds are

\(^2\) Prelacteal feeds are fluids given to newborns before breastfeeding is initiated
given to prevent dehydration, neonatal jaundice, and hypoglycomia whereas for the non medical staff it is given to ‘quench thirst’, ‘rest the mother’ etc.

In some cases the practice also appears to be rooted in tradition and fuelled by mistaken beliefs about breastfeeding. Among the Kasem and Nankani in rural northern Ghana for instance, new-borns to primiparous mothers are regularly given out to wet nurses or ‘fed on herbal teas’ whilst the mother is taken through a cultural cleansing for a period of 3 or 4 days depending on the sex of the child (Aborigo et al. 2012). Newborns in the savannah region of Nigeria similarly have an average of 47.7 hours to be breastfed for the first time postpartum (Okolo, Ademunmi and Okinji, 1999). In one rural community of India, many breastfeeding mothers have been reported by Kaushal et al. (2005) as having likeness to give prelacteal feeds (usually honey and ghutty) before breastfeeding; and for some grandmothers, breastfeeding initiation is dependent on a baby’s time of delivery. ‘If the baby was born in the morning, breastfeeding was started in the evening after seeing the stars’ (p. 367). In the study by Fjeld et al. (2008) in southern Zambia, it was also realized that whereas most mothers were not in favour of giving pre-lacteal feeds, others actively did; and in some cases water or herbs were given in order to ‘wet the mouth’ or ‘throat’ of the new born’.

2.3 Influences on breastfeeding

Across many rural communities in Africa where breastfeeding appears to be the norm, the question of whether to breastfeed or not, seldom arises since women are expected or required by the cultural practices of those societies to do so. Indeed, in both developed and the developing worlds, studies have showed the existence of several influences on EBF. In the developed world, women’s breastfeeding decisions have been shown to be influenced by their perception of partner’s attitudes (Arora, Mcjunkin, Wehrer and Kuhn, 2000) and paternal involvement in breastfeeding promotion programs (Susin and Giugliani, 2008).

After employing ethnographic techniques to study socio-cultural influences on infant feeding decisions among 22 HIV positive women in South Africa, Thairu and colleagues (2005) highlighted among other things, the fundamental role of social stigma, economic circumstance, maternal age, and family influences. The influence of family was particularly strong on decisions regarding EBF and varied along what the authors described as ‘social independence’. Young mothers below age 19 for instance were less socially independent and tended to be influenced more than their older counterparts (p.6). The influences of friends and neighbour networks have also been observed (Byrant, 1982).
Arguably, one of the most widely reported sources of influence on infant feeding across Africa, Asia, and south/Latin America has been an infant’s paternal grandmother; Kerr et al. (2008) in the northern part of Malawi, concluded on the overwhelming influence of grandmothers and even called for a discussion between them and health practitioners (p. 1103). In their study on grandmother breastfeeding support in Texas, Grassley and Eschiti (2008) argued that the act of breastfeeding is one in which the experiences and support of grandmothers are not only at all times needed by new mother, but their breastfeeding advocacy as well. According to Aubel (2006) these influences of grandmothers on infant feeding are reasonable expectations from them given their role as information providers or what he describes as ‘managers of indigenous knowledge’ (p.1)

2.4 Weaning and the weanling’s dilemma
After six months of exclusive breastfeeding, the WHO and UNICEF both recommend the rapid introduction of complementary foods. This is premised on the realization that the immunologic, developmental and contraceptive benefits of EBF tend to decline as (1) infants start to develop their own immunocompetence, and (2) breast milk alone gradually becomes insufficient to meet the nutritional needs of the growing infant especially in the second half of infancy (McDade and Worthman, 1998 cited in Wilson, Milner, Bulkan and Ehlers, 2006). Weaning thus becomes indispensable at some point in infants’ growth process. Just like breastfeeding, weaning is equally a process rather than an episode; a process that comprises three related stages: introduction of complementary foods; the period of complementary feeding along with breastfeeding; and the cessation of breastfeeding (Moffat, 2001). Inadequate food intake and/or poor nutrient content of the weaning foods in each of the three stages could lead to negative growth outcomes such as stunting and wasting. In Ghana for instance, children (29%) aged 6 to 8 months bear the highest burden of wasting while those between ages 18 to 23 months (40%) are more likely to be stunted than those less than 6 months (4%) old (Ghana Statistical Service and IFC Macro, 2009). Though the primary causes of growth differentials in children could be many, weaning foods nevertheless remain a key determinant. This is pretty evidenced by observations that children in both industrialized and developing countries experience early growth patterns that are comparably the same during the period of EBF (Waterlow, 1981 cited in Weaver, 1994). According to Weaver (1994), Weaning foods should under ideal circumstance be clean, contain high energy and protein, easy to ingest and digest, culturally appropriate, and locally available. In many traditional communities however, complementary foods are often made from cereal based flours such as
maize, rice, etc. that are not only difficult to digest but nutritionally poor. Nti and Lartey (2007) in a study on young child feeding practices and nutritional status in rural Ghana reported a general use of *unfortified koko* (a low nutrient porridge) as the first complementary food among 65% of mothers. Only 27% of the respondents studied had fortified their complementary food with legume flour and groundnut pate (p.329). Similar observations were made by Fjled et al. (2008) in the city of Mazzuka in southern Zambia, where the common complementary food that is introduced from age 2 to 6 months is maize flour light porridge often fortified with vitamin A, salt, pounded groundnut etc.

This lack of easy access to nutritionally sufficient and uncontaminated weaning foods coupled with concerns about breast milk insufficiency after 4 months have generated a certain feeling of ‘weanling’s dilemma’; a dilemma that involves different views and discussions over the universality of the optimal duration (six months) of exclusive breastfeeding (Kramer et al. 2003; Fangillo and Habicht, 1997). The debate is centred on the awareness that too early (i.e. before to six months) introduction of non-breast milk foods places an infant at a high risk of infectious diseases; yet, too much delay in giving complementary foods could also result to growth faltering occasioned by low nutritional status particularly zinc, iron and protein (Michaelsen, et al. 2000). Critics of the current universal recommendation of EBF are basically concerned with two issues: (1) that the recommendation to exclusively breastfeed all infants in all populations is driven by biomedical considerations to the neglect of local environment and culture (Moffat, 2001) and (2) that delayed complementary feeding occasioned by EBF contributes to growth faltering. While the former argument is based on the culturally dependent nature of breastfeeding, the latter is premised on conclusions from a number of studies in the industrialized countries (e.g. Copenhagen, Italy, Finland etc.) that infants with longer duration of breastfeeding experience slower growth compared to those with earlier weaning (See Michaelsen et al. 2000). Other studies however, have failed to corroborate such incidences of growth faltering. In the developing world for instance, studies from rural Kenya and rural Senegal have failed to confirm the existence of weanling’s dilemma. While the Kenyan study showed a positive relationship between duration of breastfeeding and growth, the Senegal one similarly reported a favourable effect of breastfeeding on growth even up to 28 months of age (Habicht, 2000 p. 196). Also in a review study involving 22 independent clinical trials and observational studies on weanling’s dilemma, Kramer and Kakuma (2009) found *no objective evidence of a weanlings’ dilemma* for exclusively breastfed infants in both developed and developing countries (p.2). Earlier study by Kramer and Colleagues (2003) on growth and health effects of 3 compared with 6 months of exclusive breastfeeding in Belarus concluded
that exclusive breastfeeding is linked with a low risk of gastrointestinal infection and no negative health effects in the first year of life. Indeed, in studies where exclusive breastfeeding had reportedly led to growth deficits, reverse causality (see Habicht, 2000) and in some instances selection bias, and confounding (Kramer and Kakuma, 2009) accounted for such observed difference.

2.5 Delimitation of study

Considerable part of recent studies on child health has been devoted to breastfeeding and its exclusivity. Most of the studies as evident in the above discussion were quantitatively designed to seek associations or correlations. Albeit useful; correlations per se are insufficient in understanding and explaining human behaviour. And even with those that were qualitatively studied, most of them were concerned with determinants other than the family. As a social institution and more importantly the basic unit of society, the focus of this study was thus limited to seeking deep understanding of family influences on EBF in a rural community of northern Ghana. The study participants included breastfeeding women, family members, and traditional birth attendants, and a breastfeeding support group leader.
Chapter Three

METHOD

3.1 Selecting the study area and why?

Given that qualitative research data from interviews are presented in words and not numbers, an understanding of respondents’ language and perhaps culture, was judged to be critical. This was to ensure that the original and actual responses of interviewees were to a large extent, freed from possibilities of mistranslation and misunderstanding due to language barrier. The researcher in recognition of this reality and on account of his fluency in the subjects’ language thus chose to conduct the fieldwork in Moglaa, a rural community in the Savelugu-Nanton Municipality.

The municipality is one of the twenty districts/municipalities that comprise the northern region of Ghana. It is located about 27km south of the regional capital, Tamale. It has a total population of 139,283 comprising 55,252 urban and 84,031 rural dwellers (Ghana Statistical Service, 2010). The estimated number of households in the municipality is about 14,669 with an average household size of 9.4 (ibid). The municipality is predominantly agro based with about 97% of the economically active population engaged in peasant farming. Maize, rice, yam, beans, and soya beans are some of the staple food crops that are grown. Shea nut, cotton and cashew are the only cash crops in the district (Ministry of local government and Maks Publication & Media Services, 2006). It has one hospital, three health centres, two clinics, two health posts, and one health compound. Doctor to patient ratio as of 2005 was 1:25572 whereas that of nurse to patient stood at 1:2582 (ibid). The number of health facilities with baby friendly design increased from 18% in 2003 to 62% in 2005. During the same period, the number of underweight children declined from 49% to 43% whiles those with stunted growth also decreased from 45.8% to 40% (ibid).

3.2 The Qualitative method

The method used in this study was a qualitative approach. This choice was made in line with the study’s aim and research questions. The appropriateness of this method was further underpinned by the profundity of data required to understand and explain the experiences of the subjects in relation to breastfeeding. The qualitative approach to knowing belongs to the interpretative school of thought whose ultimate goal is inter alia to understand, describe, and explores social phenomena (Naidoo and Wills, 2005). In qualitative studies the basic and almost general supposition is that individual’s perspective is meaningful, knowable, and can be expressed or shown in explicit terms (Patton, 2002). Unlike quantitative research, the
qualitative approach permits in-depth gathering of data with special care and attention to detail, context and the slightest difference in meaning (ibid. p.227).

With its focus on naturalism as a way of inquiry, qualitative research is typically conducted in pursuit of holistic and contextual interpretations of subjective realities that are socially created (Dahlgren, Emmelin and Winkvist, 2007). In contrast to its quantitative counterpart, this method has an inductive orientation which allows the qualitative researcher to put forward new theories (Dahlgren, Emmelin and Winkvist, 2007; Patton, 2002; Norwood, 2010). Such inductive orientation is further evidenced by researchers’ attempt to comprehend situations or occurrences as they happen without any imposition of their own prior knowledge and expectations (Patton, 1987). Besides understanding, qualitative investigations also allow us to explain human behaviours or social phenomena. In scientific inquiries, explanation is essentially motivated by two goals; first, to explain the world in which we live, and second, to gratify our intellectual curiosity (Okasha, 2002). In contrast with the natural world which is explained via the use of precise procedures, explanation of social phenomenon or human behaviour on the other hand, cannot be reduced to a similar method nor can it ever be achieved by looking for antecedent causes since people live in their world as active participants and not merely passive objects (Buchanan, 2000). Indeed, to explain human action is basically to identify the ‘beliefs and desires’ that occasioned them; usually by relying on tacit assumptions (Rosenberg, 2008 p.32). In other words, the mechanism that may explain a social action and its effect is premised on ‘meaningful and intentional’ behaviour of the acting individuals (Tengland, 2012). Thus, some explanatory factors e.g. systems of norms and values, social structures, economic factors, social relation, individual action etc may be helpful in understanding and explaining social phenomena.

3.3 Data collection
3.3.1 Unstructured interviews
Data collection for this study was conducted during the last three weeks of April 2013 using unstructured interviews as the main data gathering instrument. Kvale and Brinkman (2009) delineate interviews as planned conversations with purpose. As an instrument in qualitative research, interview enables a researcher to understand the social world from the perspective of subjects (Kvale and Brinkman, 2009). When interviews are conducted between the interviewer and participants, new knowledge is gained and existing ones may be understood in different ways (ibid, p. 2). Unstructured interviews have open-ended approach as they provide for a high degree of flexibility. The researcher is thus able to seek as much information as the situation or
the context allows for without fear of getting off track from a predetermined list of questions characteristic of other methods of interviewing e.g. the interview guide approach (Patton, 2002).

This type of interviewing approach however is not without limitations. Due to its greater degree of flexibility, unstructured interviews entail a likelihood that more data might be obtained from some respondents than others (ibid, p. 347). Because interviews involve two or more persons, unwillingness to cooperate on the part of subjects could also undermine the depth and breadth of information required to understand a social phenomenon from the respondent’s perspective. Inadequate or lack of knowledge about subjects’ native language and culture might as well lead to misinterpretation and misunderstanding of responses (Marshall and Rossman, 2006).

3.3.2 Recruitment of study subjects
The study participants included breastfeeding mothers, their respective family members, breastfeeding support group leader, and traditional birth attendants. The date, time, and place for each interview were scheduled by the researcher in accordance with what was most conducive and comfortable for the subjects. Interviews lasted for about 35 to 50 minutes. Given the colossal volumes of data, paper work, and audio recordings that usually go with data collection in qualitative research, the researcher was assisted by a Medical student at University for Development Studies and a graduate student of Economics at Kwame Nkrumah University of Science and Technology. Although English is the official language in Ghana, the interviews however, were conducted in the native language – Dagbani of which the researcher and his assistants are fluent. The choice of the native language was based on the high illiteracy level in the study community. The research team was fortunate to begin the interviews on a day when breastfeeding mothers in the community had assembled for regular breastfeeding support meetings. With approval from the community nurse, the researcher talked to the breastfeeding women and two of them were interviewed after the meeting. Three more breastfeeding women were later obtained using snowball sampling technique. Snowball sampling technique involves identifying and interviewing the first subject who will subsequently help to identify the next subject. The technique was very effective given the smaller size of the community and the fact that the respondents knew each other well. Each new subject assisted in identifying the next until the desired sample size was reached. A determination of the sample size was made based on the homogeneity of the participants and the limited resources of the researcher. The breastfeeding women’s respective family members on the other hand were obtained by means
of purposive sampling. With this type of sampling, subjects were recruited by the researcher because they possessed some characteristic and which in the researcher’s view was relevant for the study.

3.4 Data management
While being in the field, the obtained data through Interviews were audio taped by digital sound recorder. Data from each day’s trip to the field were stored in password protected computer and kept under lock and key. At the end of the field exercise, the data were then transported with due diligence back to Malmo University where it was again kept with utmost care. Following the completion of data analysis and presentation of findings, all audio tapes containing the interview data were immediately destroyed.

3.5 Data analysis
Qualitative data analysis is a process by means of which data is transformed into findings; yet no universally fixed formula exists for such process (Patton, 2002). Many researchers thus employ different strategies depending on the qualitative research genre. Data analysis in qualitative research seldom proceeds in a linear style. Rather, it is a back and forth activity in which the collection of data and analysis move together to produce a reasoned interpretation (Marshall and Rossman 2006). Analysis of data in this study was carried out using a seven step analytic process delineated by Marshall and Rossman (2006 p.156). These include: organizing the data; coding the data; immersion in the data; generating categories and themes; offering interpretations through analytic memos; searching for alternative understanding; and presenting the study.

Data collection, transcription, and analysis were not completely divorced from one another. With each successive trip’s interviews, the audio recorded conversations were partly transcribed in the process of which conceptual expressions and emerging patterns from the data and preceding ones were noted. Complete transcription of the interviews from oral discourse to written discourse eventually ended in the third week of the field work, and the entire data were subsequently organized and electronically catalogued according to date, identification number, and type of respondent. In the next stage of the analysis, the data were repetitively read through, revisited time and again to achieve ample immersion. Further to immersion, a closed examination of the data yielded several categories including health, ‘pakopilla’, breastfeeding, beliefs, knowledge, practices, learning, family relatives, water, sickness, traditional birth attendants, support, gender, infant, etc. A numeric scheme of coding was
employed to mark all parts of the written discourse that contained one category or another. 1 for instance, was used to code ‘breastfeeding’; 2 for ‘family relatives’; 3 for ‘knowledge’ and so on. These categories were reduced into a much smaller size by grouping similar and related ones so as to arrive at new generated categories which were largely ‘analyst constructed typologies’. That is, the typologies were formations made by the researcher and were not essentially used in explicit form by respondents (Patton, 2002). All the conceptual expressions and patterns that emerged from participants were categorised in a way that reflected the salient and subtle meaning participants attached to their expressions. As further analysis of data progressed, the initially identified concepts and categories were constantly interpreted and modified to build an understanding and coherent picture of family influences on EBF.

3.6 Ethical consideration
All ethical dimensions in this study were of utmost interest. The study thus obtained an ethical approval from the Ethics Review Board at the Faculty of Health and Society, Malmo University prior to the collection of data. This study recognized the relative sensitivity that discussions on breastfeeding had on the subjects. This was especially understandable since the principal researcher and his assistants were men. Measures were hence taken to guard against any form of harm and discomfort to the study subjects.

3.6.1 Informed consent and Confidentiality
Informed consent as averred by Silverman (2011) is a ‘process of negotiation’ between the researcher and the study subjects, and not a ‘one-off action’ (p.98). In order to achieve consent, I first introduced myself and the research assistants to each subject and subsequently enquired about their welfare and that of their families in line with the customary greetings of the people. The study purpose, risks and benefits were then explained in the local language (Dagbani) of which the research is fluent. This consent seeking process was devoid of all traces of deception and exploitation (Silverman, 2011). The researcher did again inform the informants about their right to withdraw from the study or decline any to question they considered inappropriate. Their voluntary consent in the end was sought and participants thumb printed a consent form to participate in the study as well as to permit recording of the interviews.

Confidentiality was also guaranteed by making sure that study subjects were not represented by their names. Other forms of identities and private discussions remained
anonymous and undisclosed during and after the studies. Full disclosure about the study was again made to participants and their respective concerns were also addressed accordingly.

3.6.2 Beneficence and risk

This study had no direct or immediate benefits for participants. It was however, envisaged that by studying the influences of family on breastfeeding practices, this research’s outcome will help to define the most important questions that would informed public health policy in the district. It will also contribute to the growing body of scientific knowledge on how to design and situate health interventions in rural communities.

Participation in the study equally entailed little or no risk at all for subjects. Although it never manifested, some respondents however, might have felt uncomfortable in sharing their family expectations and life experiences with someone they did not know particularly when the principal researcher was a man.

3.7 Discussion of method

Given that the choice of a method or rather, any process by means of which knowledge is produced is guided by certain standard principles of inquiry e.g. the objectives or research questions that have to be answered, the qualitative approach was chosen in line with my research questions which were carefully formulated after a thorough review of previous studies on exclusive breastfeeding. Unstructured interview approach was accordingly employed to elicit data from subjects.

In order to evaluate the soundness and/or trustworthiness of this study, the following quality standard criteria were not only considered germane, but compelling as well.

3.7.1 Validity

Validity as used in this study also stands for research ‘trustworthiness’ or ‘credibility’. Maxwell (2005) defined validity as the ‘“correctness or credibility of a description, conclusion, explanation, interpretation, or other form of account”’ (p.106). A common ‘validity threat’ that is often discussed in qualitative inquiry and which was considered relevant in this study is the researcher’s ‘bias’, preferably called ‘subjectivity’ in qualitative studies (ibid). It involves the possibility of obtaining data that fits or corroborates the researcher’s prior notions, values, beliefs, or even theories. This is conceivable in view of the fact that ‘value free’ qualitative inquiry is hard if not impossible to achieve. Rather, what is important is for the qualitative researcher to recognise and take into account how his/her own values and preconceptions might have influenced the study’s findings; and the range of measures/steps that were taken to
tone down their impact (Patton, 2002). Validity and for that matter credibility in this study was ensured through data triangulation (using multiple or variety of data sources); interviews in this study were therefore not limited to breastfeeding mothers’ account or experience, but to other sources viz. traditional birth attendance and family members e.g. grandmothers and fathers/husbands.

3.7.2 Consistency
Consistency in qualitative research, alternatively called reliability, is employed to determine the reasonable degree to which a study’s finding can be reproduced by a different researcher (or even the same researcher) in similar or the same social environment. The whole idea of ‘replication’ in qualitative inquiry is problematic particularly because of its implicit suggestion about the existence of ‘objective truth’ against which the ‘reliability’ or ‘consistency’ of one research finding would be measured. Different layers of complexity associated with human social behaviour and the fluidity of our social world further makes claims or efforts for reliability complicated. Despite the intricacy however, qualitative researchers have not abandoned hope in strengthening the reliability of their findings. A varying number of strategies thus exist to that end.

To ensure consistency in this study, the researcher took a number of steps during the interview stage, transcription stage, and the analysis stage. Leading questions for instance, were completed avoided in order to obtain unprejudiced responses and experiences of subjects. The researcher did not also hesitate to seek more clarifications on matters that were not clearly understood. Subsequent to the interview transcription, one of the research assistants, who was equally fluent in the interview language was made to compare the audio recorded oral discourse with the written discourse (the transcribe work); all his suggestions were evaluated and used appropriately to ensure consistency.

3.7.3 Transferability
When studies are transferable, they are reasonably useful to colleague researchers with similar research problem and under similar milieu. As used in qualitative or interpretative inquiries, the notion of transferability delineates the extent to which the finding of a qualitative study in context ‘A’ can be generalized to ‘B’, where ‘B’ is a population in a similar or with comparable characteristics. Thus, any new gain in perspective or knowledge is transferable to similar populations irrespective of demographic features (Dahlgren, Emmelin, and Winkvist, 2007). Given how breastfeeding as a worldwide human practice is shaped by culture, the extent
to which the present findings would be transferable is difficult to ascertain. Nevertheless, the use of several informants within the family setting, the clear delimitation of the study, and the explicit description of the methods that were employed are expected to aid concerns for transferability especially in similar populations.

3.8 Study limitation

Notwithstanding the care and deep thinking that went into the design of this study, two basic methodological shortcomings are nevertheless observable and must be mentioned as such. First, because data for this study were generated from a single data collection method i.e. unstructured interviews, one cannot discount the additional insights that would have been obtained if other methods of data gathering in qualitative research such as observation and/or focus group discussion were used to complement the interviews. Second, since participation in the study was limited to only breastfeeding women and family relatives, other important interest groups such as health care workers were not represented; and this will obviously impact our understanding and ability to explain the issues in relation to interventions.

3.9 Theoretical framework

3.9.1 Social Cognitive Theory

Any attempt to understand the tacit and/or manifest interactive influences between individuals and their social environment is most likely to garner some success when placed under appropriate theoretical guidance. This in part can be explained by the central role of theories in aiding our efforts to make sense of the social world (Nutbeam, Harris and Wise 2010). According to the theory, health behavior is influenced by a core set of determinants namely, knowledge, perceived self efficacy, outcome expectation, perceived facilitators and social structural impediments (Bandura, 2004).

Knowledge as averred by the theory is an important element of health behaviour change. When people are adequately informed about the risk and benefits of certain actions or life styles, they will be more likely or motivated to initiate a change. This knowledge or information as Bandura argued is a necessary but not a sufficient basis for change. What is needed in addition is the belief in personal efficacy (ibid). Self-efficacy as defined by Bandura (1998) is “beliefs in one’s capabilities to organize and execute the courses of action required to produce given levels of attainments” (p. 624). It is self-efficacy that enables people to set goals for themselves, and pursue the realization of those goals with much commitment and
perseverance. In the words of Bandura (2004), ‘unless people believe they can produce desired effects by their actions, they have little incentive to act or to persevere in the face of difficulties’ (p. 144) That is, individuals’ actions or inactions are closely tied to their perceived capacity to produce desired results. Although important in modifying individuals’ beliefs and lifestyles, self-efficacy however, is not an independent determinant of behaviour. It is always an impetus which in concert with other determinants e.g. perceived outcome works to produce a desired effect. Perceived outcome is a negative or positive self evaluation of one’s behaviour or action. From a social perspective, Perceived outcome may also refer to any kind of approval or disapproval that accompanies’ an individual’s action or behaviour (ibid). For any anticipated positive or good outcome, people are likely to put up behaviours to that effect while on the other hand, the same or similar behaviours may be withheld if the anticipated outcome is deemed to be bad or negative. In all cases nonetheless, individuals’ behaviour change efforts can be impeded by personal, socio-structural, economic, cultural, religious, or environmental factors etc.

In relation to breastfeeding behaviours, previous use of this theoretical framework did lead to some important insights. In one study for instance, Kessler et al. (1995) showed that a woman’s significant other (an important or influential person in somebody’s life) was found to be strongly and positively affected by intention to breastfeed. The theory’s application in this study is similarly hoped to broaden our understanding and ability to explain EBF in the context of rural families.
Chapter Four

RESULTS

4.1 Demographic characteristics of Participants
This study included a total of fourteen participants from Moglaa, a rural community in the Savelugu/Nanton Municipality. Of the total participants, there were five breastfeeding women, four grandmothers, two traditional birth attendants, one grandfather, one husband, and one breastfeeding support group leader. All participants were Dagombas and for that reason were culturally homogeneous. Nine of them were Muslims while five were Christians. The breastfeeding mothers had children aged 5 to 20 months. One breastfeeding woman was a first time mother while the others were multiparous with about four children on average. Thirteen participants had no basic or any form of formal education whereas one breastfeeding mother was formally educated up to vocational level. In addition to working as housewives, the breastfeeding women were also engaged in farming, trading, or hair dressing. Besides lacking exact information on their ages, the respondents were also sensitive to questions about age and were therefore allowed to give estimates. The youngest mother was about 22 years old whereas the eldest was above 35 years old. Three of the grandmothers were about 65 years and the other was about 50 or more years old. The grandfather too was more than 65 years. Two participants (the husband and the breastfeeding support group leader) declined from giving estimates about their ages.

4.2 Four Themes
Following analysis of the interview data, four themes emerged in relation to the forms of family influences on EBF viz.: family knowledge of breastfeeding, family beliefs and practices, collective sense of duty, and learning to breastfeed.

4.2.1 Family Knowledge of Breastfeeding
Participants showed familiarity with the concept and practice of exclusive breastfeeding. Nursing mothers in particular demonstrated a good level of knowledge on the benefits of EBF and early initiation of breastfeeding. Irrespective of whether deliveries were made at home or clinic, all the mothers reported being aware that newborns should be breastfed early and exclusively during the first six months. Early initiation of breastfeeding was said not only to be good for the child but is also needed when ‘the placenta delays or fails to come out after delivery, breastfeeding then should be initiated in order to facilitate that’ (1st Traditional birth attendant, breastfeeding support group leader). On the position of colostrums in infant feeding, all breastfeeding mothers reported being informed ‘that colostrum is good for our children because it gives them strength and good intellect’ (2nd breastfeeding mother). Another
participant also made related observations regarding her past and present attitude to colostrum: *For my first born, I didn’t feed him with colostrum although it was not expressed either. But I did feed this baby with it. We are told it is very good for the child. That it gives him strength and good intellect* (3rd breastfeeding mother).

Other family members especially males (husband and grandfather) had little information on exclusive breastfeeding recommendations. The male respondents viewed issues relating to breastfeeding as the preserve of women. In response to a query on the forms of guidance offered to new nursing mothers for instance, a male respondent answered that *‘it is for the traditional birth attendants or old women to show them and not us’* (Grandfather). Another male respondent corroborated the male perspective on breastfeeding in the dialogue below:

Researcher: *can you share with me your role [as a husband] in breastfeeding?*

Respondent: *as for breastfeeding, it hinges on our mothers [the baby’s grandmother]. They are responsible for all the training a woman would require especially for the first time mothers who have no such experience* (Husband).

While all the Grandmothers did demonstrate some level of awareness about EBF, not all of them did exhibit approval and commitment to the practice. The following dialogue between the researcher and a grandmother exemplifies that.

Researcher: *can you tell me your position on giving babies water before the sixth month?*

Respondent: *Hmmm! I will never allow my child to be thirsty. I will always give him water. I heard something like that on one occasion when I visited the Savelugu Hospital and we were told not to introduce water to the babies until 6 months later. I didn’t say anything, what I did was to remain silent about it and continued to give small quantity of water to him each time I bathed him. Water adds energy to the body so if you don’t give the child water, he/she will continue to remain light weighted* (1st grandmother).

Some of the breastfeeding mothers further reported being aware of the wavering commitment of their mother-in laws; this is also contained in the following dialogue:

Researcher: *Has there been any occasion where your baby was given water before 6 months?*

Respondent: *Yes there was. The child’s grandmother insisted that the child cannot abstain from drinking water until 6 months as such she used to secretly give him water after bathing him. Later he started having stomach aches and then the doctors said there was plenty water in his stomach* (1st breastfeeding mother).
In response to a question of preference between EBF and mix feeding, the lack of full commitment by some participants became apparent as one respondent revealed that: ‘truly, giving some water will be my choice. ‘Just imagine someone living without water for up to six months?’ (2\textsuperscript{nd} traditional birth attendant). When babies are still very young, it appears water is only given immediately after bathing him/her - which happens twice daily (morning and evening). Because of that, one breastfeeding woman reported taken certain steps to prevent the practice: I always make sure I’m present when my baby is being bathed so he has never been given water……… because they are old people, if you are not around, they may be tempted to do it( 4\textsuperscript{th} breastfeeding woman).

4.2.2 Collective sense of duty

The data again showed that a baby’s welfare including how he/she is breastfed is a responsibility on adult members of a family. Breastfeeding women are acknowledged as primary caregivers of newborns while the rest of the family participate as secondary care providers who equally have a significant role to play. Failure to breastfeed a baby in accordance with what the family defines as appropriate could provoke family displeasure on the breastfeeding woman. One breastfeeding participant for instance, recalled how her ‘first born later refused to eat Tuo Zaafi \textit{[a staple food in the community] and people were saying it’s my fault since I delayed introducing him to food}’

Researcher: Who were the ones blaming you for his refusal to eat Tuo Zaafi?

Respondent: It was just people in town and some members of my family particularly the father and the grandmother (1\textsuperscript{st} breastfeeding woman).

In another interview, a traditional birth attendant also expressed similar remarks about how family participate in infant breastfeeding in the dialogue as follow:

Researcher: In what way do family members assist breastfeeding mothers?

Respondent: Members of a family do assist in many ways. Some women for instance are very lazy or reluctant to breastfeed; in such cases, it is members of the family \textit{[who in many cases are the influential female members e.g. the paternal grandmother] who will insist that the child should be breastfed appropriately. You know, if a child is not fed well, he/she will not develop well} (2\textsuperscript{nd} traditional birth attendant).

In addition to a breastfeeding mother, a baby’s paternal grandmother was identified as an important stakeholder who is not only limited to giving guidance on breastfeeding but actually spends more time with the baby whilst the mother is engaged in something else e.g. cooking. In the words of one breastfeeding respondent, ‘the grandmother takes care of the
child to enable you do your work; she is also responsible for bathing the child every day’ (4th breastfeeding woman). Male members of the family especially the husband and grandfather have little participation in direct breastfeeding matters because of the thinking that issues relating to breastfeeding are for traditional birth attendants or the grandmothers, not us (grandfather). These male family members nonetheless were found to be supportive and showed concern when a child is sick, crying, or fails to sleep at night. This was demonstrated in the dialogue below:

Researcher: What kind of assistance do you normally get from your husband in relation to breastfeeding?

Respondent: Not much. He only calls you to breastfeed the child when he/she is crying and you are busy doing something; in that case he will ask you to leave whatever you are doing and feed the baby first (4th breastfeeding woman). Other nursing women expressed similar comments about the little involvement of fathers and for that matter adult male family members on breastfeeding issues ‘except when the child is sick or is crying’ (1st breastfeeding woman). For the father, a baby’s cry is understood to mean either a want for breast milk or that the baby is not well. If the cry is interpreted to mean the former, and the breastfeeding mother is not around the immediacy of the child; this then elicits the father’s intervention to call her or take the baby to where she is.

4.2.3 Family beliefs and practices

Further analysis of the data also showed the existence of belief systems and practices connected to breastfeeding. Two broad forms of these cultural and/or religious practices were reported viz. ‘pakopilla moag’ and ‘nyuhibu’. The pakopilla moag [literally translated as ‘white widows’ herbal concoction’] is primarily performed to protect newborns against diseases and sicknesses believed to be caused by contact with widows who are sexually active even though they haven’t remarried. This ritual concoction was succinctly explained by one respondent as follows:

We still have the ‘pakopilla moag’ in this community because all the women I recently assisted to deliver did use that herbal concoction after their births. If the baby is a boy, he is bathed with the concoction for three days; and for baby girls, it is done for four days. Besides bathing, the baby is further made to drink a little. Once it is done, the baby will be protected against diseases /harm from ‘pakopilla’ (2nd traditional birth attendant).
Further description of the practice was again detailed by another respondent in the dialogue below:

Researcher: Are you aware of any ritual(s) or use of concoction that is linked to breastfeeding or is done after child birth?
Respondent: The one I know is called ‘pakopilla moag’ which is undertaking to protect the child from harm caused by ‘pakopilla’
Researcher: Can you describe what that means?
Respondent: When a woman’s husband dies and she begins to engage in sexual activities before being married again then she is not supposed to take or come across new born babies. If she does that, the baby will become sick. The herbal concoction is therefore given to the baby to prevent such sicknesses.
Researcher: How is the herbal concoction administered?
Respondent: The baby is bathed with it and made to drink a small quantity.
Researcher: When is it done?
Respondent: Just after delivery (3rd breastfeeding woman)

Not all the respondents reported having observed the practice in their families. Those who reported abstinence (three breastfeeding women) from the practice had either abandoned the traditional account of disease aetiology or were motivated by their faith (Islam or Christianity). On the whole, participants who professed Christianity were more likely to completely give up any use of concoction in relation to breastfeeding while whose professed Islam were more inclined to use an alternative concoction deemed to be ‘Islamic’. One such respondent recalled that ‘the baby’s father gave him a concoction prepared by writing some Quranic verses for him to drink. The purpose is to protect the baby from evil forces and harm’ (2nd Grandmother).

Besides the ritual concoctions meant for newborns, participants again identified ‘nyuhibu’ [which literally refers to the process of aiding someone to drink something] as a Dagbon traditional ritual concoction that is performed to essentially increase breast milk supply. ‘Cow milk, millet, and other ingredients are the ones required to prepare the drink’ (grandfather). Neither every male member of the family nor the family head can make the ritual. Only few people have the knowhow; and ‘we have only two of them in this community’ (Husband). Unlike the pakopilla herbal concoction, the ‘nyuhibu’ ritual concoction is made for only breastfeeding women ‘and once they drink it, the milk will become plentiful by the end of that day’ (Husband).

In addition to the aforementioned practices, participants in this study also held a belief that a drop of breast milk on a baby’s penis would lead to impotency in adulthood. Such effect
of the breast milk is connected to the presence of the ‘bad hair’ (the hair with which a baby is born) which is usually shaved on the 7th birth day. It is thus strongly recommended to cover a baby’s nether region whilst breastfeeding during that period. This was expounded by a traditional birth attendant in the following:

‘What is encouraged especially during the first week of breastfeeding is to cover a baby boy’s penis while breastfeeding. This will prevent the breast milk from dripping on the penis which when happens, causes infertility later in life; In some cases, the infertility can only be overcome after the death of the man’s mother’ (2nd Traditional birth attendant).

Another belief that was reported by some participants is the relationship between breastfeeding and pregnancy. On the average, children in the community are breastfed for two and half years and thereafter weaned. On few occasions however, a child could be weaned much earlier than the norm as a result of an onset of pregnancy. Breast milk during pregnancy is ‘believed to be warm and causes diarrhoea as well’ (breastfeeding support group leader).

4.2.4 Learning to breastfeed

Data from all breastfeeding women also did reveal a number of channels through which they learn various aspects of breastfeeding. Participants identified the community clinic, the women breastfeeding support group meetings, family tutelage and observation as the learning resources on breastfeeding. Respondents reported being informed and assisted by nurses to initiate breastfeeding immediately after delivery. Subsequent information about breastfeeding recommendations including EBF and breastfeeding on demand were passed on to them (the breastfeeding women) via the leadership of the breastfeeding support group in the community. The group was originally founded by some few women as a ‘self help’ platform to promote their children’s welfare. It was later recognised and absorbed by the clinic to serve as a link between breastfeeding women and the Reproductive and Child Health Unit of the Community Clinic. Group leaders convene with members (nursing mothers) twice every month (on Thursdays) at the clinic. It has four leaders who are regularly taken to the Savelugu Municipal Hospital for updates on breastfeeding and child health. At some of their training programs, the leaders are supplied with pictorial breastfeeding pamphlets copies of which are given out to nursing mothers to enable learn more about breastfeeding (breastfeeding support group leader). Participants’ learning experiences with the breastfeeding support group are further illustrated in the dialogue below:

Researcher: How did you acquire information on breastfeeding?
Respondent: *People from the clinic used to come and teach us three times every month. They later stopped but have now started again.*

Researcher: *Is the teaching done at your homes or where?*

Respondent: *It is done at the clinic. Two women are trained by the by clinic and they too will come and teach us* (1̊ breastfeeding mother).

In addition to the clinic and the women support group, breastfeeding mothers again identified grandmothers (mother-in-laws), and traditional birth attendants as other important resources on breastfeeding. Grandmothers and traditional birth attendants were particularly named for providing guidance on appropriate breastfeeding positions and how to ensure good attachment. One grandmother pointed out that they *‘normally educate breastfeeding women on the kinds of food items that can increase milk supply. We also educate them on how to properly position the baby for optimal feeding’* (Grandmother). Another nursing mother recalled after her delivery that *‘it was she [the baby’s paternal grandmother] who guided me on the basic techniques of infant feeding such as how to correctly position the child for successful breastfeeding’* (4̊ breastfeeding woman).

On traditional birth attendants, nursing mothers indicated that *‘they also provide lots of support. They are still very active in teaching us about breastfeeding although the hospital is taking over that duty. Pregnant women in some cases may give birth at home and they will be in charge. But the Traditional Birth Attendants and the hospital are now together since they teach them about current breastfeeding methods’* (1̊ breastfeeding woman).

Whereas all the aforementioned learning platforms constituted the major learning resources for all the nursing mothers, observation too was named by some respondents and confirmed by family significant others as a learning tool. Breastfeeding in the presence of family and friends or even in public places is an acceptable practice is most rural and urban Ghana. This provides an indirect learning platform for some expectant mothers who are interested in learning. Observational learning in most instances was linked with nursing mothers’ previous role as baby caretakers. With the exception of one participant, the rest of the breastfeeding participants recalled being a child caretaker at some point in time and that means *‘you will have another opportunity to learn something about breastfeeding’* (2̊ breastfeeding mother). Such observational learning by child caretakers was again pointed out by a traditional birth attendant in an interview. She emphasised that *‘a caregiver may even offer her own breast to a baby although it contains no milk yet; this is one of the strategies baby caregivers normally use when a baby is crying for milk and the mother is not immediately available’* (2̊ traditional birth attendant).
4.3 Discussion of Results

The findings of this study highlight the influences of family on EBF in rural Ghana. The study reveals that decisions on how an infant is breastfed in an extended family setting are influenced by complex cultural, religious, power and gender relations, and socio-structural factors. For purposes of clarity, the following discussions will again be grouped into the four themes presented above.

Family knowledge of breastfeeding

It is often thought that a breastfeeding woman with adequate information about EBF and its benefits for the child and herself will be more apt to practice it than her counterpart with little information. Such an assertion although plausible, is however problematic as it ignores the importance in levels of understanding of those of her kin who might in one way or another be involved in child care and feeding processes. In this study, family members’ knowledge of breastfeeding recommendations has been showed as having fundamental influences on efforts and decisions to exclusively breastfeed. All the breastfeeding women in the study were found to be well informed on EBF. Besides EBF, they (breastfeeding mothers) also showed desirable forms of infant feeding practices such as early initiation of breastfeeding and the use of colostrums. Breastfeeding mothers’ use of colostrums is mainly explained by two motivations. First, that colostrum makes babies healthier and less susceptible to sicknesses; and second, that babies who are fed with colostrum will have good intellect to enable them perform well at school. While the former motivation about colostrums’ use is totally supported by epidemiological research, scientific findings on the latter have been lacking. Given the scientific origins of these beliefs about colostrum, it is reasonable to think that the breastfeeding mothers might have acquired such understanding about colostrums from nurses and the breastfeeding support group meetings.

Other important players in the family e.g. grandfather and father exhibited a rather little understanding of breastfeeding recommendations due mainly to cultural and gender explanatory factors. The participants’ household structure is built on a patriarchal system wherein gender is an important determinant of what one is expected to ‘know’ and/or ‘do’. As averred by one participant, issues of direct breastfeeding import³ are meant ‘for traditional birth attendants or the grandmothers, not us’ (grandfather); as such, men’s little knowledge about breastfeeding matters is seen as typical and not an exception. Unlike their male counterparts,

³ An exception is when breastfeeding related rituals need to be performed; and this is because men are often the performers of such rituals.
grandmothers on the other hand were found to be very supportive and influential on how infants’ are breastfed. Their influential role as found in this present study corroborates an earlier finding by Kerr and colleagues (2008) in the northern part of Malawi. Similar studies have also reported the advocacy function of grandmothers (Grassley and Eschiti, 2008) and grandmothers as ‘managers of indigenous knowledge’ (Aubel, 2006 p.1). Besides their influence, they had also been moderately informed about EBF recommendations which although promising, seem in adequate in winning their commitment for the practice. Some of them as noted early on questioned the relevance of allowing babies to be thirsty over a six month period. The lack of commitment on their part can fairly be explained by disparities on EBF familiarity. More often than not, information on EBF recommendations is primarily tailored to meet the needs of breastfeeding mothers as if they live in isolation from other family members. Such approach consequently creates disparities in levels of understanding between breastfeeding mothers and their family relatives; and this is especially true for paternal grandmothers who notwithstanding their level of influence, are often left out in many public health interventions. Traditional birth attendants also exhibited a good understanding about breastfeeding recommendations primarily because of their closed working relations with the community nurses.

**Family beliefs and practices**

The findings of this study also revealed a number of practices with both cultural and religious significance that are associated with breastfeeding and/or infants’ welfare. In support of the earlier proposition by social cognitive theory, breastfeeding women although were found to be aware and interested in EBF, they nevertheless could not translate their knowledge into successful EBF due in part to these socio-cultural and religious practices which acted as impediments to their quest. Of the practices that were identified, the ‘pakopilla’ ritual concoction, while being traditionally perceived to be protective against diseases or any form of harm caused by ‘pakopilla’ (‘white widows’), has nonetheless, a harmful effect on EBF since it involves feeding an infant with small quantities of herbal teas for a number of days. Public Health interventions to completely stop the practice are unlikely to succeed in view of its perceived protective benefits. What might work instead is negotiating an end to that aspect of the ritual which involves feeding newborns with the herbal tea/concoction. Fortunately, there appears to be a gradual transition away from the ‘pakopilla’ ritual concoction; Christians in particular have given up the practice to their faith, while Muslims have sought an ‘Islamic’ substitute. The effect of religion especially Christianity, in dwindling similar traditional
practices connected to breastfeeding was previously noticed by Aborigo and colleagues (2012) in a related study in northern Ghana. Moreover it is tempting to think that the biomedical account of disease aetiology and prevention techniques is gaining acceptance among sections of rural families. This is a least evidenced by the full commitment and trust with which breastfeeding women have reposed in exclusive breastfeeding recommendations.

In contrast with the aforementioned practice, the ‘nyuhibu’ ritual as reported in this study is mainly carried out to increase breast milk supply. In the past, most women who were thought to lack adequate breast milk supply had their babies’ breastfed by wet nurses - who were mainly family relations or friends. Due to changing perceptions about wet nursing among the families, the practice is no longer in use and women with perceived breast milk insufficiency problems are ask to visit the clinic if the ‘nyuhibu’ breast milk ritual fails to yield satisfactory results. Although newborns are not directly involved in the ritual, its success or failure significantly influences how a baby is fed.

It is instructive to learn that the interests of breastfeeding mothers are considered less important and practically have no effect on the performance of traditional or religious breastfeeding rituals. The paternal grandmother, father, and the grandfather are basically the decision makers. In a qualitative study in Mozambique, Arts et al. (2011) made similar conclusions on the role of these family actors in influencing decisions on exclusive breastfeeding. Also important to point out are some of the breastfeeding related beliefs that were found. One of them is the belief that a drop of breast milk on a baby’s penis will lead to impotency if it happens before the baby’s seven birth day. An important part of the belief as stated early on is the presence of the ‘bad hair’ which implies that any drips of breast milk subsequent to shaving such bad hair may not occasion the impotence. Accidentally, the effect of this particular belief on EBF seems to be neutral because it neither encourages nor impedes a quest to exclusively breastfeed. In a similar vein, respondents’ perception of breastfeeding during pregnancy further adds to how breastfeeding as a universal act is understood and shaped by cultural beliefs and practices. These beliefs about how breastfeeding is affected and/or affects some acts and bodily states or processes e.g. pregnancy, have again been observed in many other cultures. Awumbila (2003) for instance, also reported early cessation of breastfeeding due to pregnancy among the Kusasi in northern Ghana, while among newly delivered mothers in Nigeria, Ojofeitimi (1981) as cited in Popkin et al. (1983) found that majority (88.3%) of the respondents studied refrained from after birth sexual contact for fear that the baby ‘might suck sperm from the breast which might eventually lead to diarrhoea’ (p.14). All these aforementioned beliefs and practices in one form or another constitute the
cultural/religious explanatory factors that influence exclusive breastfeeding practices among the families studied.

Collective sense of responsibility
Rapid economic and technological developments in western industrialized societies have in part led to a dramatic disappearance of extended family structures. Consequently, matters of reproductive importance including child birth and care have been greatly redefined and restructured. In its place, several maternal and paediatric institutions have been entrusted with the responsibility of assisting breastfeeding women in ways comparable to what families had hitherto done. This description, however different it might look, is clearly the converse of what prevails in rural communities of Ghana. The family continues to be an important social network wherein effective participation and support from members are a necessary part of everyday activities including child care. In this way, the family sense of collective responsibility exerts some noteworthy influences on breastfeeding and its exclusivity for that matter. Results from this study show that breastfeeding women are primary caregivers of children who are expected to breastfeed in line with what secondary caregivers (members of her family) may defined as appropriate. Equal participation of each member is not expected because child care is constructed and understood in terms of gender. As such, female members of a family have significant involvement in matters of direct breastfeeding than their male counterparts. Indeed, all the families studied were without exception patriarchal, with gender based social roles and statuses; which to some extent explains why decisions on how newborns are breastfed rest with a woman’s female significant other who in most cases happens to be a child’s paternal grandmother. By virtue of their previous birth experiences and elderly wisdom, grandmothers are deemed to possess in-depth insight on infant feeding which when differs from modern breastfeeding recommendation is difficult to challenge. The upshot consequently is that, nursing mothers face multiple and conflicting expectations regarding how to breastfeed. While nurses would recommend exclusive breastfeeding for newborns, grandmothers or aunts may on the other hand insist on energising babies with water or porridge. By taking such stance, grandmothers appear to be cognitively motivated by certain outcomes which they perceived as ‘threats’ (e.g. the claim that children will be ‘thirsty’ or ‘light weighted’ if not given water) to the well being of infants. Amid such conflicting demands and expectations, breastfeeding mothers are often confronted with a dilemma which eventually diminishes their self-efficacy to start and maintain exclusive breastfeeding.
The results further indicate that male members of a family especially the father and the grandfather have little participation in matters of direct breastfeeding import. This result is slightly different from findings in a study by Aborigo et al. (2012) in Kassena-Nankana district of northern Ghana where males were found to have had considerable involvement in breastfeeding matters (p. 8). Albeit their little participation, the male family members were found to be concerned when a baby is sick, consistently fails to sleep at night, or crying; and this again is explained by the gender based division of responsibility. Men are considered bread winners of the family while women are practically responsible for domestic works such as cooking, cleaning, child care etc. which are done under the supervision of grandmothers. Because of this division of labour, the tacit assumption is that everyone (the male - female divide) performs or at least is expected to perform his/her role with little or no interference from the other divide except when something is perceived to have gone amiss. So depending on how a baby’s cry is interpreted, a husband or grandfather for that matter might intervene to help remedy the ‘situation’ by for instance, consulting a soothsayer, or herbalist if the cry is interpreted to mean spiritual sickness. A husband may also provide money for medical and transport expenses if a child is deemed to require clinical treatment.

**Learning to breastfeed**

Finally, the data from this study as indicated in the results identified a relatively varied means through which nursing mothers acquired knowledge on breastfeeding. The main learning resources for breastfeeding women included the community nurses, family guidance, regular education from the women’s breastfeeding support group, and observation. Much of the education from the nurses is targeted at breastfeeding women especially postpartum. Learning activities of the women’s breastfeeding support group as alluded to earlier constitute not just a regular learning resource but an important source of support for nursing mothers who are paying attention to EBF. Notwithstanding the group’s manifest goal of providing support for breastfeeding mothers and child welfare promotion in general, it is still nonetheless interesting to question the primary inspiration behind the group’s formation. After all, both the community clinic and the family system are designed to accomplish similar goals. This, to reasonable extent, is explained by the group’s latent desire to meet their unmet support and learning needs through collective action. By forming such support group, the breastfeeding women are not only gradually achieving their manifest and latent goals but are also leading a learning revolution; a revolution in which so much optimism and confidence are reposed in modern medical recommendations, and for that matter, exclusive breastfeeding.
Until fairly recently, the aforesaid and rather formal means of learning how to breastfeed rarely existed in most rural Ghana; and even now, the family as a social and learning institution continues to serve as an important resource for breastfeeding women. Elderly members of the family are considered repositories of traditional beliefs and knowledge inherited from forebears to present members. Issues of reproductive importance such as marriage, child birth and child care are under the purview of elderly women (grandmothers) from whom the younger women are expected to learn. From the adolescent period until child birth, young women are socialised and taught on what constitute proper infant feeding through observations and then practical guidance. Given their subordinate position in families, breastfeeding women are not only expected to learn their family’s conception of appropriate feeding but are required to demonstrate much interest in practicing them. Unlike the practice in the developed world, learning from family neither involves formal guidance from paediatricians, nor reading breastfeeding books. It is instead, by osmosis - a gradual and often unconscious process which may start as early when a teenage girl works as baby caretaker to as late as during pregnancy or postpartum.

**IMPLICATIONS FOR PUBLIC HEALTH POLICY**

Much of the current public health interventions on exclusive breastfeeding are traditionally tailored to the needs of breastfeeding women. Given how family players participate and decide on the type of feeding for newborns, it is suggested that public health education campaigns should aim at increasing the familiarity of family relations on EBF. This can be achieved by empowering family members especially those at the top of the family echelon viz. grandmothers, fathers, traditional birth attendants, and grandfathers. Increased access to information on breastfeeding and reproductive health in general would especially be vital in modifying families’ conceptions of ‘appropriate’ infant feeding.

Results from this study also reveal the importance of breastfeeding support group in disseminating knowledge on EBF and may thus be an important partner in public health interventions. The formation of similar groups in other rural communities may as well be an essential policy target. Beyond incorporating such groups’ activities into community clinics’ own, further discussions and logical support for them would be useful in winning the EBF battle.

Finally, it is important to realize that not all traditional beliefs and practices are harmful to EBF. Some of them appear to be neutral (e.g. covering the neither region to avoid drips of breast milk on the penis) while others seem to be helpful (e.g. believing that colostrum gives
good intellect). As such, awareness creation on breastfeeding issues needs to be examined beyond breastfeeding know-how to include clarifications of common beliefs and perceptions that are unhelpful to EBF practices. While some religious and cultural beliefs about breastfeeding seem entrenched, important family actors and religious leaders if properly educated about EBF could be used to modify and/or discourage such practices that involve feeding newborns with herbal teas and ritual concoctions.

**Conclusion**

The present study was an attempt to understand and explain influences on exclusive breastfeeding in the context of rural families in Ghana. The study showed that rural families are important social organizations and networks wherein effective participation and support from members constitute an essential part of everyday activities including child care. Infant feeding and for that matter exclusive breastfeeding is thus heavily influenced by breastfeeding women’s families. The results show very informed breastfeeding women who are committed to learning and practising exclusive breastfeeding. Nurses and breastfeeding support group meetings were the main sources of information on EBF recommendations for breastfeeding women while family relatives heard about the recommendations from them. As a result, Grandmothers, fathers, and grandfathers who are the main decision makers in the family and also constitute breastfeeding mothers’ significant others were found to possess little knowledge on breastfeeding recommendations and hence exerted little commitment to support the practice. It was further shown that breastfeeding mothers’ quests to exclusively breastfeed were regularly influenced by their families’ beliefs and practices over which they lacked control. The families’ system of mutual infant care that regard breastfeeding women as primary caregivers of babies who are expected to breastfeed in line with what secondary caregivers (members of her family) may define as appropriate also contributed to making exclusive breastfeeding practice a lot more difficult for breastfeeding women. While the influences highlighted by this study contain many implications for public health policy, a lot nevertheless remains to be studied. Further research is particularly needed to explore how traditional beliefs, practices, and indigenous knowledge on breastfeeding can be negotiated and modified to promote public health interventions especially on issues relating to breastfeeding.
ACKNOWLEDGEMENTS

In the course of writing this thesis and by extension the period during my training in Public Health, I have incurred lots of debts for which acknowledgements are necessary. I am particularly grateful and eternally thankful to the following:

- Almighty Allah with whose permission I live and with whose countless favours I continue to remain grateful. Verily, you are the all-sustainer and all-provider for mankind.
- European Union and the MUNDUS ACP team at Malmo University and Porto for your generosity in awarding me a scholarship to pursue my dream
- Ronald Stade, my supervisor, for your expert comments and friendly company throughout the period
- Ellis Janzon, my lecturer and program director, for being available at my service all the time; this project would have been very difficult but for your assistance and guidance.
- Oscar Anderson, my lecturer and initial supervisor, for your preliminary insightful comments about my topic and research design.
- Per –Anders Tengland, Berglund Staffan, and Slobodan Zdravkovic, my lecturers, for all your stimulating lectures, seminars and exams; we couldn’t have gotten better than we had. Tack!
- Limpho, Kudzai, Julius, Fanny, Shifra, Sandra, Niclas, Vicky, Sonja, and Muna, my course mates for your friendship and wonderful contribution to discussions in class
- Nengak Daniel, a true friend, for all your critical comments on my work and the interesting discussions we had.
- Jane and Chandra, my former floor mates, for your company, friendship, and the IT assistance you offered me on numerous occasions.
- Mba Afa and Mma Moshie, my dad and mum for your care, love, best wishes and prayers; May Allah bless you
- My brothers (Mr.: A. Salam, Adam, A. Majeed, Habib, Ismail, Hardi etc.), sisters (Rukaya, Kubra etc.), uncles, and cousins (K.D) for all the love, support, and prayers throughout my education
- Awula, my wife for your patience, prayers, and encouragement
- Muhammad and Suale, my friends and assistants during my data collection exercise. I really enjoyed your company and appreciate your assistance.
- All the breastfeeding mothers, grandmothers, husband, grandfather, traditional birth attendants, and the breastfeeding support group leader whose voluntary participation made this study a reality.
REFERENCES


Dahlgren, Lars, Maria Emmelin and Anna Winkvist. 2007. *Qualitative methodology for international public health*. Umea: University University


Duncan, B. et al., 1993. Exclusive breastfeeding for at least 4 months protects against otitis media. *Pediatrics*; 91 (5)


Fjeld, E. et al., 2008. ‘No sister, the breast alone is not enough for my baby’ a qualitative assessment of potentials and barriers in the promotion of exclusive breastfeeding in Southern Zambia. *International Breastfeeding Journal* 3:26


Santé (Montrouge France). 2002. Breastfeeding in Africa: will positive trends be challenged by AIDS epidemic? PMID 12 (1) Abstract only. Available at [http://ukpmc.ac.uk/abstract/MED/11943640/reload=0;jsessionid=faLTKT8Ge1LiR6ZTGmc.2](http://ukpmc.ac.uk/abstract/MED/11943640/reload=0;jsessionid=faLTKT8Ge1LiR6ZTGmc.2)


*The Holy Bible: King James Version*. Available at [www.Search-The-Bible.com](http://www.Search-The-Bible.com)

*The Noble Qur’an: English translation of the meanings and commentary*. Madina Munawwarah: King Fad Complex. Available at [www.qurancomplex.org](http://www.qurancomplex.org)


UNICEF., 2010. Improving exclusive breastfeeding practices by using communication for development in infant and young child feeding programs. UNICEF Publications


Weaver, L. T., 1994. Feeding the weanling in the developing world: problems and solutions. *International Journal of Food Sciences and Nutrition* 45; 127-134


APPENDIXES

Form

Informed consent

App endix 2

(submitted along with Appendix 1 to the participant joining the project for signature)

<table>
<thead>
<tr>
<th>Projektets titel: (ifylles av student)</th>
<th>Datum: (ifylles av student)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Family influence and exclusive breastfeeding in rural Ghana</td>
<td>13th, March 2013</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Studieansvarig/a: (ifylles av student)</th>
<th>Studerar vid Malmö högskola, Hälsa och samhälle, 206 05 Malmö, Tfn 040-6657000</th>
</tr>
</thead>
<tbody>
<tr>
<td>Iddrisu Seidu</td>
<td>Masters in Public Health</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Din E-post som student vid Malmö högskola: ej din privata e-post (ifylles av student)</th>
<th>Utbildning: (ifylles av student)</th>
</tr>
</thead>
<tbody>
<tr>
<td><a href="mailto:M11P0634@student.mah.se">M11P0634@student.mah.se</a></td>
<td>Nivå: (ifylles av student)</td>
</tr>
</tbody>
</table>

| | Advance |

I have been verbally informed about the study and read the accompanying written information. I am aware that my participation is voluntary and that I, at any time and without explanation, can withdraw my participation.
I hereby submit my consent to participate in the above survey:
Date: ............................................................... 
Participant’s signature: ..............................................

Form

Permit to conduct research
(to be signed by the head of department)

Projektets titel: (ifylles av student)
Family influence and exclusive breastfeeding in rural Ghana

Datum: (ifylles av student)
13th, March, 2013

Studieansvarig/a: (ifylles av student)
Iddrisu Seidu

Studerar vid Malmö högskola, Hälsa och samhälle, 206 05 Malmö, Tfn 040-6657000

Utbildning: (ifylles av student)
Masters in Public Health

Nivå: (ifylles av student)
Advance

Din E-post som student vid Malmö högskola: ej din privata e-post (ifylles av student)
M11P0634@student.mah.se

Hereby, I offer the following student/students permission to conduct the above mentioned study in my working area.