Research Paper:

# Development of suitable functional clothing for lactating woman and assessment of its preferences

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### **ABSTRACT**

Maternity clothing has a niche market in today's fashion era because of increase number of women worker with the attitude of being well dressed during pregnancy also as at any other time in their life. Maternity clothes have very significant role during lactation period also because breast feeding in regular clothes become awkward and embarrassing. Thus, there is a great need to design clothing for pregnant and lactating women. All lactating women gave their preference towards vertical and horizontal opening with zipper at bust level, hidden flaps up to bust level detachable with Velcro and snap fasteners. Developed functional maternity *kameezes* were found highly suitable among lactating women in terms of suitability of structural features, functional aspects, selection of materials and colour combinations used.

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**Key words:** Functional maternity clothing, Breast feeding

Clothing is a primary need of mankind through out the word. Clothes help to make impression on others. Uncomfortable clothes can take away the joy of living. This is equally true for special groups, whose needs are greater because they need more comfort and convenience as compared to normal people to become independent.

Recently, national attention has been focused on the rights of women to nurse their babies in public places. In less industrialized countries, where breastfeeding is a community norm, nursing babies accompany their mothers everywhere and breastfeed at will. In many other countries, breastfeeding is considered so natural that people scarcely take notice of it.

The topic has come into the spotlight on a number of recent occasions when mothers who were breastfeeding their hungry infants were asked to leave public places because exposing their breasts to nurse might be offensive to other patrons. In each case that has been challenged in a court of law, the right to breastfeed in public has been upheld. So, maternity clothes are also very significant during lactation phase because breastfeeding in regular clothes become awkward and embarrassing. Breastfeeding in public can make many women feel self conscious and uncomfortable. Breastfeeding clothes should have a hidden opening, strategically built-in to the clothing.

The present study was undertaken to study the availability of appropriate functional clothing for lactating women in the market, to assess the satisfaction of lactating women with available maternity clothes, to design and develop functional clothing for lactating women and to find out the preferences of lactating women towards developed clothing.

### METHODOLOGY

The present study was carried out at Udaipur city of Rajasthan. Ten marketing personnel were selected to know the availability of maternity clothing in local market. To know the satisfaction with available maternity clothing and needs and requirements towards developing functional maternity clothing, 30 female lactating respondents were selected from the Sanjeevani Child and Maternity Hospital, Udaipur. Pretested structured interview schedule was used for getting the complete and desired information. The functional garments were given to the respective respondents for wear trial of a period of three consecutive days to assess the acceptability and preferences. The frequency, percentage, Mean percentage score (MPS) and Acceptability Index was calculated to analyses the data.

### FINDINGS AND DISCUSSION

The following section contains the outcome of the

major observation made during the study. The findings of the present study are discussed here below:

### Satisfaction with available maternity clothes:

The data in Table 1 shows that 73.33 per cent respondents said that maternity clothes are not available in the market and remaining 26.67 are less available per cent respondents said that in maternity clothes Liengeries and feeding Gowns are available in the local market.

Table 2 shows that majority of respondents (70%)

Table	1 : Distribution availability of	of respondents f maternity clothe			
Sr. No.	Variable	No. of respondents	Percentage		
1.	Easily available	Nil	-		
2.	Less available	8	26.67		
3.	Not available	22	73.33		

were found satisfied with material of garments and remaining 30 per cent respondents were less satisfied.

Regarding the constructional details, it was found that 40 per cent respondents were satisfied with length of garment whereas 36.67 per cent respondents were less satisfied and 23.33 per cent respondents were not satisfied with length of garments.

With regards to garment fitting, 83.3 per cent respondents were not satisfied while 16.67 per cent respondents were less satisfied.

An equal percentage of the respondents (40%) were less satisfied and not satisfied with the length of sleeves. Remaining 20 per cent respondents were satisfied with length of sleeve.

Majority of respondents (76.67%) respondents were

not satisfied with fitting of sleeve whereas 16.66 per cent respondents were less satisfied. Only very few (6.67%) respondents were satisfied with fitting of sleeves.

It was found that 50 per cent respondents were less satisfied with neck line shape, 26.67 per cent respondents were satisfied and remaining 23.33 per cent respondents were not satisfied with availability of neck line shape in the maternity Gowns.

Further, 63.33 per cent respondents were found 'less satisfied' with size of neck, 26.67 per cent respondents were found 'not satisfied' and remaining 6.66 per cent respondents were 'satisfied' with size of neck in the garment.

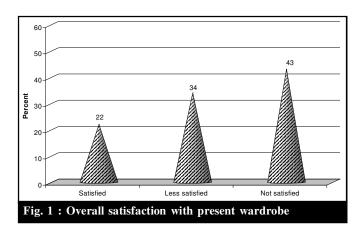
Data related to functional details shows that 43.33 per cent respondents were not satisfied with type of fasteners used, 36.67 per cent respondents were less satisfied remaining 20 per cent respondents were found satisfied with type of fasteners used.

Majority of respondents (70%) were not satisfied with opening in garments and 30 per cent respondents were less satisfied and remaining 6.67 per cent respondents were found satisfied with the opening in the garments.

The Table 3 shows that over all 22 per cent respondents were satisfied with material of garment, constructional and functional details, 34 per cent respondents were less satisfied and 43 per cent respondents were not satisfied. Hence need arises to train

Table 3 : Overall satisfaction with present wardrobe (N=30)						
Sr. No. Aspect Percentage						
1.	Satisfied	22				
2.	Less satisfied	34				
3.	Not satisfied	43				

Table 2: Distribution of respondents according to satisfaction with material, constructional and functional details of garment $(N=30)$								
Sr. No.	Aspect	Sa	tisfied	Less	Less satisfied		Not satisfied	
		F	%	F	%	F	%	
1.	Material of garment	21	70	9	30	-	-	
2.	Constructional details							
	Length of garment	12	40	11	36.7	7	23.33	
	Garment fitting	-	-	5	16.7	25	83.33	
	Length of sleeve	6	20	12	40	12	40	
	Fitting of sleeve	2	6.7	5	16.7	23	76.67	
	Neckline shape	8	26.7	15	50	7	23.33	
	Size of neck	3	10	19	63.3	8	26.67	
3.	Functional details							
	Type of fastener used	6	20	11	36.7	13	43.33	
	Opening in the garment	2	6.67	7	23.3	21	70	



and educate the lactating women for the proper selection of the garment based on their requirement to gain maximum satisfaction.

## Needs and requirements of lactating women for developing maternity clothing:

Table 4 (a) and (b) shows that all the respondents (100%) gave their preference towards Cotton fabric, because of its inherent characteristics such as cool (73.33%), feel comfortable (96.67%), easy availability (100%), with in the budget (60%), easy to care (63.33%) and its absorbency (100%).

Preferences of blended fabric was reported by 26.67 per cent respondents because of easy availability (87.5%),

Table 4(a): Distribution of respondents by preference of material for maternity clothing (N=30) Sr. Respondents Type of material No Frequency Percentage 1. Cotton (woven + knitted) 30 100 2. Hosiery 2. Synthetic Blended/ mixed 26.67

inexpensive (100%), easy to care (100%) and wrinkle free (87.5%) property.

$\label{eq:condition} Table \ 5: Distribution \ of \ respondents \ according \ to \ preference \\ of \ fasteners \ N=30)$							
Sr.	Variable	Respondents					
No.	v arrable	Frequency	Percentage				
1.	Button – button holes	5	16.67				
2.	Press button	18	60				
3.	zipper	30	100				
4.	Velcro	6	20				
5.	Hook – eye	4	13.33				

The data reveals that most preferred fasteners was zipper (100%) followed by Press-button (60%), Velcro (20%), Button-button holes (16.67%) and Hook-eye (13.33%).

The specifications of five selected *kameez* designs by clothing and textiles experts are as follows.

These five functional maternity *kameezes* were developed by the researcher using standard construction techniques.

### Assessment of suitability and acceptability of functional garments:

These five developed functional maternity *kameez* were given to the respective five respondents for a period of three consecutive days for wear trial to find out their relative ranking, preferences and acceptability.

In order to assess the preferences and acceptability of developed functional maternity *kameez*, a rating Performa was developed based on five points rating scale and was given to respondents.

The responses derived for each *kameez* were coded and presented in following table. The Table 6 depicts the mean percentage score of selected five functional *kameez* 

Table 4(b): Distribution of respondents by type of fabric preferred and its reason (N=30)										
Sr.	Sr. No. Reasons for preferences	(	Cotton		Hosiery		Synthetic		Blended	
No.		F	%	F	%	F	%	F	%	
1.	Feel cool	22	73.33	-	-	-	-	-	-	
2.	Feel comfortable	29	96.67	-	-	-	-	-	-	
3.	Easily available	30	100	-	-	-	-	7	87.5	
4.	Acc. to budget	18	60	-	-	-	-	8	100	
5.	Easy to care	19	63.33	-	-	-	-	8	100	
6.	Absorbent	30	100	-	-	-	-	-	-	
7.	Give warmth	-	-	-	-	-	-	-	-	
8.	Easily stretchable	-	-	-	-	-	-	-	-	
9.	wrinkle free	-	-	_	-	-	-	7	87.5	

<sup>\*</sup>Multiple responses

### Plate 1: Sketches of functional maternity kameez for lactating women Functional maternity kameez with horizontal zipper pattern Front- (\_) shape neck line, use of zipper in horizontal position at bust level for opening, use of pippin and show button Back- plain with round shape neckline. Plain sleeve II\*Functional maternity kameez with hidden opening flap Front- sweet home neck line, hand embroidery use below neckline for aesthetic appeal, use of press button for opening, pippin use on neck and sleeve Back- plain with U shape neckline. Short length Plain sleeve. Ш\* Functional maternity kameez with vertical zipper pattern Front- U shape neck line embellished with wide lace, double slide vertical zipper use on both side for opening (jacket like pattern) Back- plain with round shape neckline. Short length Plain sleeve. IV\* Functional maternity kameez of princess pattern with jacket Front- U shape neckline with small curves, printed jacket with show buttons for opening, vertical zippers on both side at bust level under jacket, use of contrast pippin on jacket and princess panel. Back- plain with U shape neckline. Elbow length plain sleeve Functional maternity kameez with detachable flap Front- V shape neckline, both contrast flaps attached at waist but can easily detachable from shoulder with Velcro, colored lace use on flaps for embellishment Back-plain with U shape neckline. Short length Plain sleeve

Table 6: Mean score of developed five functional kameez for relative ranking (Kameez for lactating women) (N=5)								
Sr. No.		Mean score of developed kameez with design code						
	Criteria of evaluation	Design Sketch Code No: IV*	Design Sketch Code NoII*	Design Sketch Code No. –I*	Design Sketch Code NoV*	Design Sketch Code NoIII*		
1.	Suitability of structural features incorporated	25 (100%)	25 (100%)	24 (96%)	23 (92%)	18 (72%)		
2.	Suitability of material	24 (96%)	25 (100%)	23 (92%)	22 (88%)	19 (76%)		
3.	Suitability of aesthetic features	25 (100%)	24 (96%)	24 (96%)	21 (84%)	19 (76%)		
4.	Easy opening with fasteners	24 (96%)	23 (92%)	25 (100%)	22 (88%)	20 (80%)		
5.	Over all appearance	25 (100%)	25 (100%)	24 (96%)	22 (88%)	19 (76%)		
	Total score obtained by selected	123	122	120	110	95		
	kameez							
	Acceptability index	98.40%	97.60%	96%	88%	76%		

Data in parenthesis depicts percentage

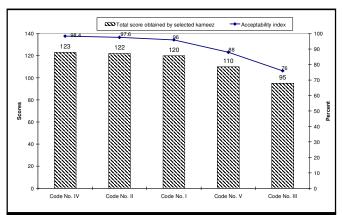


Fig. 2 : Mean score of developed five functional *kameez* for relative ranking (*Kameez* for lactating women)

for lactating women.

Researcher was curious to find which functional maternity *kameez* got maximum score, it was interesting to record that design sketch code-IV\* from the category of 'Designs for lactating women' secured the highest score of 123 point out of 125 points.

Table 6 reveals that design code no-IV\*, II\*, I\*, V\*, III\* got 1<sup>st</sup>, 2<sup>nd</sup>, 3<sup>rd</sup>, 4<sup>th</sup>, 5<sup>th</sup> ranks with the mean score 123, 122, 120, 110, 95 respectively out of 125 scores from the category of 'dress designs for lactating women'.

#### **Conclusion:**

Thus, it can be concluded that developed functional maternity *kameezes* were found highly acceptable among lactating women in terms of suitability of structural features, functional aspect, selection of material and colour

combination used.

It can be recommended from the present study that maternity garments with functional feature are very much required there can be "Special Maternity Stores" in each town/ city. The developed designs can be used by garment manufacturing units to serve this special group of consumers who have specific needs of comfortable garments which can be worn with ease and fulfill their functional need.

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