

Policy Brief #56

**Poisonous Cosmetics:  
Regulating mercury  
containing skin whitening  
creams (SWCs) in Pakistan**

By:

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## Introduction

The obsession for fair skin in the subcontinent is believed to have emerged with the introduction of the cast system according to which fair complexion was considered as the domain of the upper ruling class, whereas dark complexion was associated with the lower working class. (Islam KS et al. 2006). It is also suggested that the migration of Aryans, who were much fairer than the local population, may also have influenced the dark skinned population's desire for fair complexion.

The use of mercury (3<sup>rd</sup> most hazardous chemical) in various cosmetic products, particularly for its skin whitening effects, has been in practice since the nineteenth century (US NIH, 1996) and such products continue to be easily accessible in open markets and are most commonly used world around including many developing countries.

Presently, preference for a fair skin has also been intensified by the fairness cream industries through extensive electronic & print media campaigns. The most unfortunate exaggerations in some advertisements can even reach to the extent that they project fair skin as an essential prerequisite for success in both professional and personal matters.

Very few investigations on mercury added products and their use by consumers have been carried out in South Asia, including Pakistan. The present study is continuation of our earlier studies on mercury added products at SDPI (Khawaja et al. 2014, 2016), carried out in view of Minamata Convention on Mercury, already signed by 128 countries (including Pakistan) and ratified by 38 countries (Minamata Convention, UNEP). This policy brief focuses on the findings of our recently completed study, carried out to investigate the health threats and challenges, due to use of Skin Whitening Creams (SWCs) in some selected main cities of Pakistan. In the light of the findings, described and discussed in the following pages, we strongly recommend the following:

1. Development and implementation of mercury specific policy, legislation, national emissions & releases standards, minimum allowable Hg in products, licensing protocols for production/manufacturing/formulation.
2. Ratification of Minamata convention on mercury (2013) at the earliest time possible by Pakistan and other countries.
3. Awareness raising regarding toxicity and health hazards resulting from chemicals/chemicals added (including mercury) consumer products use, protection and control measures for workers.
4. By 2020 "Phase out" cosmetics (with Hg content above 1ppm), including SWCs, soaps & creams.
5. All the consumer products with added chemicals must be appropriately labeled by the manufacturers with all ingredients disclosure, clearly indicating the amount of chemicals and the manufacturer updated contacts/address.

6. Review & revision of MBBS/Dermatology curriculum.
7. Ban on all SWCs with mercury content above 1 ppm with immediate effect.

## Methodology

The study was carried out in two parts. First, the sampling and analyses for the determination of total mercury contents in SWCs sold and purchased by the consumers from the open market. In the second part, contacts were made, in person, with 50 dermatologists/skin specialists (male & female) in 29 hospitals and 14 private clinics of the selected cities (Peshawar, Islamabad & Rawalpindi) and through a questionnaire (**Annex 1**), their opinion/recommendations on SWCs related issues were sought (**Annex 2**). Samples of 20 SWCs (**Annex 3**) different brands were purchased from the retail shops in the open markets of the above referred selected main cities. For SWCs assay, acidic digestion of the homogenized SWCs samples was followed by total mercury content measurements by flow injection mercury system - FIMS-CVAAS (tti 2016). The results are described in Table 1.

**Table 1:** Studied SWCs and their Mercury content (ppm)

<i>Sample ID</i>	<b>Hg Content (ppm)</b>	<i>Sampling City/Location</i>	<i>Date of purchase</i>
KC-1	2.04	Karachi	3-Jan-16
KC-2	6610	Karachi	3-Jan-16
KC-3	7680	Karachi	3-Jan-16
KC-4	0.69	Karachi	3-Jan-16
KC-5	12000	Karachi	3-Jan-16
KC-6	26000	Karachi	3-Jan-16
KC-7	9900	Karachi	3-Jan-16
KC-8	0.39	Karachi	3-Jan-16
KC-9	26500	Karachi	3-Jan-16
KC-10	<0.05	Karachi	3-Jan-16
KC-11	0.18	Karachi	3-Jan-16
HC-12	0.31	Haripur	1-5 dec 2015
HC-13	0.13	Haripur	1-5 dec 2016
HC-14	0.57	Haripur	1-5 dec 2017
IC-15	0.19	Islamabad	6-Jan-16
IC-16	11.4	Islamabad	6-Jan-16
IC-17	3.76	Islamabad	6-Jan-16
LC-18	13900	Lahore	13-14 jan 2016
LC-19	7060	Lahore	13-14 jan 2017
LC-20	17300	Lahore	13-14 jan 2018

## Results and Discussion

Mercury content were found to be in the rang 0.13 (HC-13) - 26,500 ppm (KC-9). Mercury content of one sample (KC-10) seems to be less than 0.1ppm. Eight samples (KC-4, KC-8 & KC- 10-11, HC-12-14 & IC-15) showed (Table 1) mercury content less than 1ppm (requirement of Minamata Convention on Mercury). On the basis of the observed total mercury content in the studied 20 samples and the health risk due to mercury exposure from the same, the studied SWCs may be categorized in four major groups (Table 2) as most hazardous (Hg content > 10,000 ppm), highly hazardous (Hg content > 5000 ppm), moderately hazardous (Hg content < 5000 ppm ) and least hazardous ( Hg content < 1ppm ).

**Table 2:** Categorization of Studied Mercury Containing Hazardous SWCs

SN	Levels of Hazardousness			
	Most Hazardous ( Hg >10000 ppm)	Highly Hazardous (Hg >5000 ppm)	Moderately Hazardous (Hg <5000 ppm)	Least Hazardous (Hg <1 ppm)
1	KC-5	KC-2	KC-1	KC-4
2	KC-6	KC-3	IC-16	KC-8
3	KC-9	KC-7	IC-17	KC-10
4	LC-18	LC-19		KC-11
5	LC-20			HC-12
6				HC-13
7				HC-14
8				IC-15

SWCs users are exposed to alarmingly high levels of mercury in SWCs which may result in mercury being absorbed, inhaled or ingested, thus causing adverse impacts (to consumers health directly and children’s indirectly) which are well known and well established. These include effects on neurological development, growing brain, nervous system, lungs and kidneys.

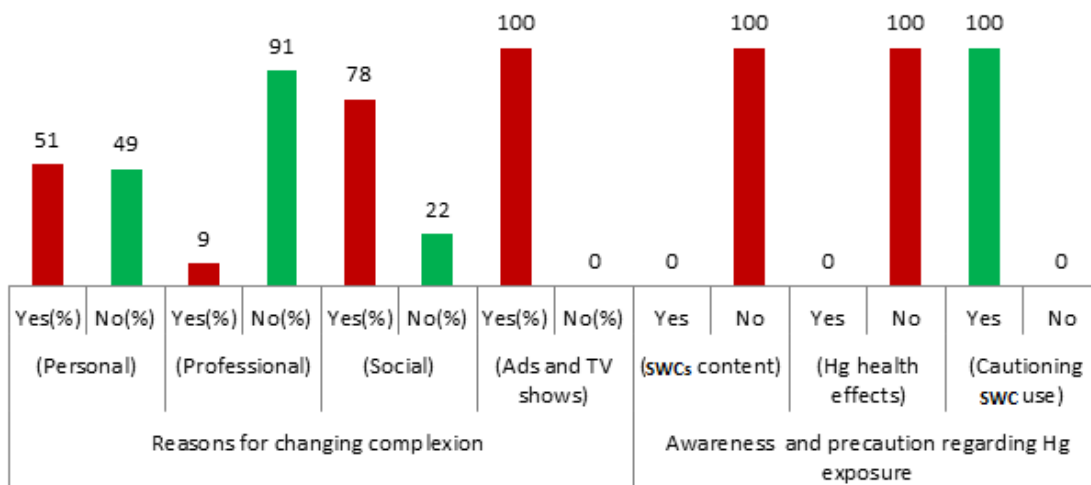
In Figures 1-A & 1-B overall findings are highlighted, of a few selected mercury related questions (Annex 1) put up to all the respondents (Annex 2)) during survey/interviews of dermatologists/skin specialists in Peshawar, Islamabad and Rawalpindi.

Regarding *reasons for changing complexion* (figure 1-A), the majority of dermatologists (91%) interviewed in the 3 main cities, thought it was not due to “Professional” but social (78%) or personnel (51%). As a result, people use products such as SWCs to lighten their skin tone and thus put their health at significant risk. These social pressures for acquiring fair complexion are mostly directed through advertisements and TV shows that strongly suggest the viewers with exaggerated benefits of having a fair skin tone. When asked about number of *visiting patients/week*, 33% respondents were visited by 10 – 50 patients/week with request for change of complexion, 28% and 41% respectively received more than 50 and

less than 10 such requests per week (Figure 1-B). There is consensus among all respondents (100%) that SWCs promoting advertisements and programs (including morning TV shows) should be banned immediately.

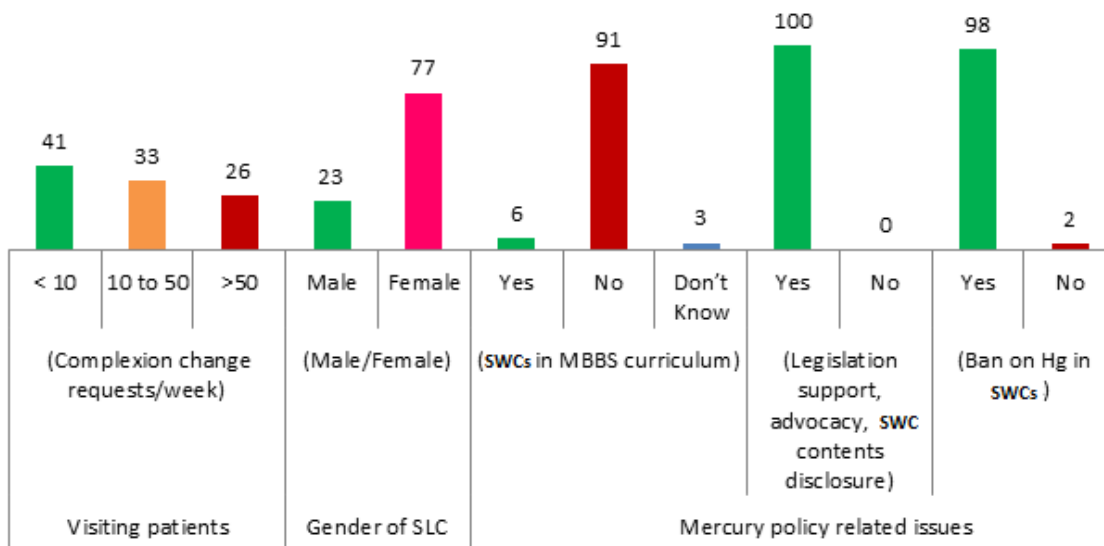
**Figure 1-A:**

Survey responses on complexion change, SWCs advertisements and awareness issues



**Figure 1-B:**

Survey responses on visiting skin patients, their gender, curriculum and policy issues



One of the reasons for the extensive use of SWCs in Pakistani population is the lack of awareness of the hazardous contents/ingredients of SWCs and their possible health risks

among the public, as agreed by all respondents (100%). Since SWCs users are unaware of the contents of SWCs and their health impacts, the application of SWCs continues for self-medicated extended period of time. All the dermatologists/skin specialists claimed that they very strongly caution their patients about the adverse health effects of these products such as SWCs containing high levels of toxic chemicals such as mercury (Figure 1-A).

To our surprise, the current study reveals that 23% of the patients received by dermatologists were male, the remaining 77% being females (Figure 1-B). This suggests that the use of SWC is not only common among the females population of the country but men are also conscious of their complexion and use SWCs to lighten their complexion. This trend among the male population may also be increasing due to the increased publicity/projection regarding SWCs through advertisements in print and electronic media. Majority of patients (45%) visiting skin care centers are of age between 25-40 years.

There's unanimous support (100%) of all dermatologists interviewed for awareness raising, regulating the manufacturing and sale of SWCs and display of information (full ingredients disclosure) regarding the ingredients and their amounts in the products, on the labels of SWCs products.. 91% support the review and revision of current MBBS curriculum/syllabus and to include mercury related information. (98%) support **ban on the manufacturing and sale of SWCs** with mercury content higher than 1ppm, as required under Minamata convention on mercury (Figure 1-B).

In addition to many types of health conditions/ailments commonly observed among the patients who have a history of SWCs use, including hypersensitivity and sometimes, dermatitis, skin abscess and even fungal infections & allergy. All visited dermatologists pointed out that SWCs users also develop conditions such as skin sensitivity, thinning, peeling & acne formation, hyperpigmentation, dark spots and freckles. Most of these skin conditions/ailments due to the use of SWCs have also been reported earlier by Faye O et al. (2005); Pitché P et al. (2005) and Ajose FAO (2005). However, these may also develop due to the presence of other skin lightening agents in the SWC products, beside mercury such as hydroquinone and steroids.

## **Conclusion and recommendations:**

From the literature survey, results of analyses of 20 samples of SWCs and the opinions expressed by 50 dermatologists/skin specialists, it is very evident that with the continued use of mercury containing SWCs, the skin is affected, becomes unhealthy and ugly looking. Besides, mercury absorbed through the skin, causes adverse health problem to human health. Such SWC brands need not be used at all. There is dire need of public awareness raising (through social, print & electronic media), regarding the high level of hazardous mercury & other chemicals contents in SWCs and their effects both on the skin and to



human health. People need to understand that “Healthy” skin is beauty not its “Complexion” and people should not hunt for SWCs which use lead to unhealthy and ugly skin.

At present, there does not seem to be an effective check and balance in place for the direly needed assessment of chemicals in consumer products, at Ministry of Health/health departments, Pakistan Medical & Dental Council (PMDC) and Pakistan National Accreditation Council (PNAC). Specific regulations need to be developed and implemented, especially regarding standards for chemicals content in consumer products, including cosmetics/SWCs. All products need to have proper labels (mandatory), clearly indicating the amount of the chemicals added to the products (full ingredients disclosure), with updated address/contacts of the manufacturers/suppliers. Consumer products, containing excessive amount of chemicals be banned for sale/manufacturing. Environmental protection agencies may also be involved in view of environmental pollution caused by the chemicals use and resulting hazardous emissions/effluents /wastes. It is also recommended that Higher Education Commission (HEC) looks into MBBS syllabus/curriculum for the needed additional information for dermatology specialization, about chemicals in cosmetics (especially SWCs) and their adverse health effect.

WE strongly recommend ban on the production/use of skin lightening creams with total mercury content above one ppm as per the requirement of Minamata convention on Mercury.

***Detailed report is accessible at***

***[http://sdpi.org/publications/publication\\_details-796-29.html](http://sdpi.org/publications/publication_details-796-29.html)***

### **Acknowledgements:**

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Pitch  P, Kombat  K, Tchangai-Walla K. Cosmetic use of skin bleaching products and associated complications. *Intl J Dermatol* 2005; 44(Suppl 1):39-40.

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## Annex 1.

# Survey Performa/Questionnaire for Dermatologists & Skin Specialists in Islamabad, Rawalpindi and Peshawar

### Skin Whitening Creams and Their Health Impacts



#### SDPI Survey Form

Date&Time

Private Clinic  General Hospital  Teaching Institution

Address

Skin Specialist

Professional Experience

Note: SWC for Skin Whitening Cream

1. What number of patients do you receive with skin problems?  < 10 /week  10-50/week  >50 /week
2. Which part of the body skin is mostly affected?  Face only  Hands and Face  Others
3. How many patients with skin problems are due to skin whitening cream use?  < 10 /week  10-50/week  >50 /week
4. Which type of diseases do you often observe among SWC users?
5. How many patients visit you to treat their skin complexion?  < 10 /week  10-50/week  >50 /week
6. Do you generally recommend SWC?  Yes  No
7. Which creams do customers prefer the most for skin fairness?
8. For what reasons do you think people want to look fair?  Matrimonial  Job requirement  Advertisements  
 Self Satisfaction  Society Influence
9. Are patients aware of the toxic chemicals like mercury used in skin whitening creams?  Yes  No
10. Are patients aware of the hazardous effect of toxic chemicals like mercury used in skin whitening?  Yes  No
11. Do you caution your patients regarding the adverse effect Hg containing SWC?  Yes  No
12. Is SWC , their toxic chemicals contents and their health impacts included in the teaching curriculum.  Yes  No  Dont Know
13. Do you think proper legislation, awareness raising campaigns and proper content display on the container need to be taken as preventive measures against such SWCs.  Yes  No
14. Do you think such SWCs should be banned by the regulatory authority?  Yes  No
15. What alternatives would you suggest/use for skin fairness treatment?

Thank You.

Signature:

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**Annex 2:**  
**List of Dermatologists**

SN	Specialist	Address	Contact	Email	Professional experience
1	Simeen Ber Rehman	Aesthetic skin and laser clinic, 304 line 3-A, Near Maryam hospital, Peshawar road, Rawalpindi	051-2532680 0331-5092732 0333-5564868	<a href="mailto:simeenber@yahoo.com">simeenber@yahoo.com</a>	25
2	Dr Moizza Tahir	CMH, Rawalpindi	032-5063128	<a href="mailto:drmoizzatahir@yahoo.com">drmoizzatahir@yahoo.com</a>	16
3	Maj Gen Zafar Iqbal Sheikh	MH, Rawalpindi	3345105554		34
4	Dr Syeda Farzana	Maryam Memorial hospital Rawalpindi	3232669076	<a href="mailto:drfarzana94@hotmail.com">drfarzana94@hotmail.com</a>	1
5	Dr Muneeza Hassan	Capital hospital Islamabad	0333-5204321		20
6	Dr Shireen Ansari	Polyclinic hospital, Islamabad		<a href="mailto:drshireenansari@hotmail.com">drshireenansari@hotmail.com</a>	25
7	Dr Nigar Kanwal	Polyclinic hospital, Islamabad	0345-5168310	<a href="mailto:imnigar@hotmail.com">imnigar@hotmail.com</a>	11
8	Dr Koukab Gulzar	KRL hospital G-9/1, Islamabad	0333-5733132	<a href="mailto:sarfhospital@hotmail.com">sarfhospital@hotmail.com</a>	16
9	Dr Robina Qureshi	PIMS, Islamabad	0333-5500463	<a href="mailto:dr.robinaqureshi@gmail.com">dr.robinaqureshi@gmail.com</a>	
10	Dr Nazeer Ahmad Sahito	Capital hospital, Islamabad	0315-5232839		23
11	Dr Rushqia Mukhtar	PAEC Hospital, H-11/4 islamabad	051-8463417	<a href="mailto:rushqia@yahoo.com">rushqia@yahoo.com</a>	11
12	Dr Asif Kamal	NESCOM Hospital	0333-5347648	<a href="mailto:skinasif@yahoo.com">skinasif@yahoo.com</a>	8
13	Dr Sarah Naeem	Kulsum memorial hospital	3345506007	<a href="mailto:drsarahn@yahoo.com">drsarahn@yahoo.com</a>	9
14	Dr Saman Waseem	2nd floor, Bangish Plaza, Block 13-V, Jinnah Super, Islamabad	0302-8866556	<a href="mailto:saman@dermabliss.pk">saman@dermabliss.pk</a>	15
15	Dr Farzana	cosmetic laser and skin clinic	051-2280747		15
16	Dr. Nighat	skin and laser clinic Office 9, 1st floor, Fazal arcade, F-11 Markaz, Islamabad	051-2112662, 2550483		12

17	Dr Samina Sohail	78, Nazimuddin Road, F-8/4, Islamabad	0300-8566676 0303-0509745	<a href="mailto:dr.samina@live.com">dr.samina@live.com</a>	16
18	Dr Humma Abbas	Skin Esthetics laser and skin clinic, 1138, Neelum Road, G-9/4, Islamabad	0334-1804387 051-2264813	<a href="mailto:skinessheticsclinic@gmail.com">skinessheticsclinic@gmail.com</a>	12
19	Dr Fauzima Anwar Bhatti	Get Well medical center E-17, G-10 Markaz, Islamabad	0300-5141089 051-2293717	<a href="mailto:fauzima@yahoo.com">fauzima@yahoo.com</a>	7
20	Dr Kiren Shehryar	Life Care Hospital G-10 markaz, Islamabad	0316-5188855 0345-7130047	<a href="mailto:drkiren.sh@gmail.com">drkiren.sh@gmail.com</a>	4
21	Dr Shuana Shrif	Medicare center Siddique Chowk, Rawalpindi		<a href="mailto:shawana.sharif@gmail.com">shawana.sharif@gmail.com</a>	10
22	Dr Tasneem Elahi	Healer's center, main kali tanki Stop, Rawalpindi	0333-5100650	<a href="mailto:dr_tasneemshakir@hotmail.com">dr_tasneemshakir@hotmail.com</a>	30
23	Dr Ahmad Imran	Cantt General Hospital Rawalpindi	0333-5101989	<a href="mailto:draimran@yahoo.com">draimran@yahoo.com</a>	21
24	Dr. Aizaz Ahmad	Cosmesurge international hospital, main Saidpur road, Rawalpindi	0321-8548304 0332-5419168	<a href="mailto:cosmesurge.pk@hotmail.com">cosmesurge.pk@hotmail.com</a>	15
25	Dr. Nadia	Benazir Bhutto Hospital, Rawalpindi		<a href="mailto:nadia_doctor@hotmail.com">nadia_doctor@hotmail.com</a>	8
26	Dr. Marvi Tahira	Benazir Bhutto Hospital, Rawalpindi	0332-5817949		21
27	Dr. Tameez Uddin	Skin clinic, Near alladin fun house, Sixth road, Rawalpindi			35
28	Dr. Abdul Majid Khan	Healthcare Hospital, Holyfamily Road, Rawalpindi	0332-8888615 051-4942229		7
29	Col. Dr. Sohail	Madina Medical Center, Saidpur Road, Rawalpindi	051-4414155 4418833	<a href="mailto:mmcpk@hotmail.com">mmcpk@hotmail.com</a>	31
30	Dr Farid Ur Rehman	Fauji Foundation Hospital, Rawalpindi	0300-9503167	<a href="mailto:dr_faridurrehman@yahoo.com">dr_faridurrehman@yahoo.com</a>	13
31	Dr Muneeza Rizwan	PAF Hospital AHQ, E-9 Islamabad	051-9505833	<a href="mailto:muneezar@yahoo.com">muneezar@yahoo.com</a>	16
31	Dr Uzma Waqar	Quaid Azam International Hospital, Near Golra More, Peshawar road, Rawalpindi	051-8449100		16
33	Dr. Nousheen Rizwan	Quaid Azam International Hospital, Near Golra More, Peshawar Road, Rawalpindi	03235010332	<a href="mailto:noshderm@yahoo.com">noshderm@yahoo.com</a>	10
34	Dr Syed Shahid Raza	Quaid Azam international Hospital, Near Golra more, Peshawar road, Rawalpindi	0320-9066662	<a href="mailto:Shahid.kazmi80@gmail.com">Shahid.kazmi80@gmail.com</a>	10

35	Dr Yousaf Durrani	Fouji Foundation Hospital, Hussain Abbas Shaheed Rd, Peshawar	0300-8584125	<a href="mailto:yousufdurrani@hotmail.com">yousufdurrani@hotmail.com</a>	20
36	Dr.Asher Ahmed Mashhood	Combined Military hospital, Mall Rd, Peshawar Cantt	0336-9679843	<a href="mailto:Asher.mashhood@yahoo.com">Asher.mashhood@yahoo.com</a>	16
37	Dr Sakina Sadiq Malik	Combined Military Hospital, Mall Rd, Peshawar Cantt	03215108737		6
38	Dr Nuzhat Shaheen	Lady Reading hospital, Ander Shehr, Grand Trunk Road, Peshawar	091-9211430	<a href="mailto:doctornzt@yahoo.com">doctornzt@yahoo.com</a>	2.5
39	Dr Shad Mohd Wazir	Khyber Girls Medical College, Hayatabad, Peshawar	03218308266	<a href="mailto:Shadm222@gmail.com">Shadm222@gmail.com</a>	25
40	Ms Shazia	Dean trade center, Peshawar Cantt	0306-8836951		15
41	Dr Sadaf Rauf	Khyber Teaching Hospital, University Town, Peshawar		<a href="mailto:Kr.sadaf@gmail.com">Kr.sadaf@gmail.com</a>	6
42	Mr Sohail Yousaf	Hayat Mohd skin care and medical clinic, SSUB plaza, Nasir Bagh road, Peshawar	03339819211	<a href="mailto:Sohail_usaf@yahoo.com">Sohail_usaf@yahoo.com</a>	20
43	Mr Hajat Mohd	Hayat Mohd skin care and medical clinic, SSUB plaza, Nasir Bagh road, Peshawar	0302-5969602	<a href="mailto:Hayatmohammad84@gmail.com">Hayatmohammad84@gmail.com</a>	3
44	Dr Fazal Wahid	Skin clinic, SSUB plaza, Nasir Bagh road, Peshawar	091-5852295	<a href="mailto:Fazal.skincare@gmail.com">Fazal.skincare@gmail.com</a>	8
45	Dr Mustafa Alam	104, Town Tower, Jahangirabad, University Road, Peshawar	03139544896	<a href="mailto:dermosurgeon@hotmail.com">dermosurgeon@hotmail.com</a>	10
46	Dr Syed Mujahid Hussain	Khattak medical center, dubgarri garden, Peshawar	03469218323		20

47	Dr Qammar Uddin Khan	Combined Military hospital, Mall Rd, Peshawar Cantt	0336-9679843		
48	Mollusc Skin And Laser	Dean trade center, Peshawar Cantt			
49	Dr Mustafa Ahmad	Laser light skin and cosmetics			
50	Dr Ashfaq Ahmad	Kuwait teaching hospital, Abdara Chowk University Road Peshawar			
51	Dr Zakeem Ahmad	Khyber medical center, Dabgari garden, Peshawar			
52	Dr Meraj Khan	Khyber medical center, Dabgari garden, Peshawar	0092 3339142459	miraj.mk@gmail.com	
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54	Dr Arshad Khan	Khyber medical center, Dabgari garden, Peshawar	0092 91 2211241		
55	Dr Azar Rashid	Habib medical center, dabgari garden, Peshawar	051-2565316		
56	Dr Inaam Ullah Khan	Habib medical center, dabgari garden, Peshawar	0092 3009320611		
57	Dr. Irshad Hakim	Khyber medical center, Dabgari garden, Peshawar	0092 91 2211241		

**Annex 3:**  
**List of SWCs studied**

SN	Brand	Manufacturer	Date of production	Date of expiry	Sampling City/Location	Sample color
1	Arche Cream Pearl	NG	22-Aug-15	NG	Gulistan e Jauhar Karachi	Off white
2	Brido Whitening Cream	CPHL Mingora, Swat-Pakistan.	NG	NG	Gulistan e Jauhar Karachi	Shiny Off White
3	Faiza Beauty Cream	Poonia Brothers Pakistan	23-Nov-15	23-Nov-18	Gulistan e Jauhar Karachi	Off white
4	Golden Pearl Beauty Cream	NG	30-Nov-15	31-Dec-17	Gulistan e Jauhar Karachi	Off white
5	Lookfresh Whitening Cream	CPHL Mingora, Swat-Pakistan.	NG	NG	Gulistan e Jauhar Karachi	Light green
6	Parley Whitening Cream	Khyber Chemicals Pvt Ltd LHR Pak	20-Sep-15	19-Sep-18	Gulistan e Jauhar Karachi	Light green
7	Samrah Whitening Cream	Poonia Brothers Pakistan	16-Dec-14	16-Dec-17	Gulistan e Jauhar Karachi	Light brown
8	Skin White Gold Beauty Cream	Skincare Company Pakistan	NG	NG	Gulistan e Jauhar Karachi	Peach
9	Stillman's Bleach Cream	Stillman Company Inc. USA	Dec-15	Dec-18	Gulistan e Jauhar Karachi	Shiny White
10	Kojic Acid Whitening Facewash	The Vitamin Company, USA	1-May-17	May-17	Gulistan e Jauhar Karachi	Transparent
11	Loreal Cream	16, Place Vendome 70051 Paris	Mar-15	Mar-18	Gulistan e Jauhar Karachi	Shiny White
12	Skin White Cold Cream(With Honey)	Skin Care Company Pakistan	NG	NG	D stop GT Road Haripur	Shiny White
13	Skin White Whitening Cream	Skincare Company Pakistan	Apr-14	Apr-17	D stop GT Road Haripur	Shiny White
14	Whitening Crème Bleach	Golden Girl Cosmetics USA	Aug-15	Aug-18	D stop GT Road Haripur	Light Pink
15	Yoko Whitening Cream	SIAM YOKO CO.Ltd Thailand	Sep-15	Sep-20	G10 Markaz ISB	Off white
16	BLESSO Whitening Cream	HCL London	NG	NG	G10 Markaz ISB	Shiny White
17	Yoko Whitening Cream (Ginseng And	SIAM YOKO CO.Ltd	Aug-13	Aug-18	G10 Markaz ISB	Off white
18	White Face Whitening Cream	NG	NG	NG	Upper mall Scheme Lahore	Apple White
19	Pure White Beauty Whitening Cream	Pure white Cosmetics pak	July 1st, 2015	July 1st,2018	Upper mall Scheme Lahore	Off White
20	Due Whitening Cream	Kreative Cosmetics .Ltd	1-Dec-14	1-Dec-17	Upper mall Scheme Lahore	Parrot Green

NG: Not given/provided by the manufacturer



