

GOVERNMENT OF THE PUNJAB

IRRIGATION DEPARTMENT



FLOOD FIGHTING PLAN FOR THE YEAR 2025.

**FAISALABAD IRRIGATION ZONE, FAISALABAD
JHANG DIVISION LCC (W) JHANG**

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FLOOD FIGHTING PLAN 2025

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PART – A

CHAPTER-1

SALIENT FEATURE OF DIVISION

Jhang Canal Division is one of the Divisions of Lower Chenab Canal West Circle, Faisalabad Zone and started its function from 17-08-1911. It irrigates the area under the command of Bhowana Branch and Jhang Branch Lower Canal System. Out of an area of 678,489 acres GCA, 533,366 acres CCA of District Faisalabad, Jhang, Chiniot and Toba Tek Singh falls in the jurisdiction of Jhang Canal Division. Irrigation system of division comprises of two Branch Canals off taking from Tail of Jhang Branch Upper named as Jhang Branch Lower and Bhowana Branch Canal and its Sub System of Channels consist of 31 number distributaries and 42 number minors. It comprises of four Sub Divisions headed by the Sub Divisional Officers, namely; Wer, Dhaular, Veryam & Flood Bund.

In addition to above mentioned canal system, there are three Flood Bunds as following:-

1. Jhang Flood Protection Bund
2. Thatta Mahla Flood bund
3. Loop Bund

These Bunds were constructed by the Irrigation Department during the years 1950 & 1959, to check the spill of River Chenab entering in Jhang Sadar and the other abadies of Jhang City with the total length of 26.70 miles.

Thatta Mahla flood Bund was constructed to save the Jhang City, valuable crops and vital installations. The said Flood Bund breached during the Flood of 1973 and major damages occurred in the Jhang City. To improve the condition of the Flood Bund, it was remodeled and its top level was raised up to a free board of 5` above High flood level of 1973. Loop Bund is a second defense

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line for the Thatta Mahla Flood Bund. It starts from RD. 1500 Thatta Mahla Flood Bund and terminates at RD. 11500 adopting a shape of Loop.

AREA UNDER COMMAND OF JHANG DIVISION

	G.C.A (In acres)	C.C.A (In acres)	G.A (In acres)	Fish Forms (In acres)
Total Area under the Division	678489	533366	-	-
<i>EXISTING AREA</i>				
Wer Sub Division	191752	154303	491.49	-
Dhauhar Sub Division	262189	204676	2427.52	2.16
Veryam Sub Division	224548	174387	4301.08	8.50
Flood Bund Sub Division	-	-	-	-
Total Area of Division	678489	533366	7220.09	10.66

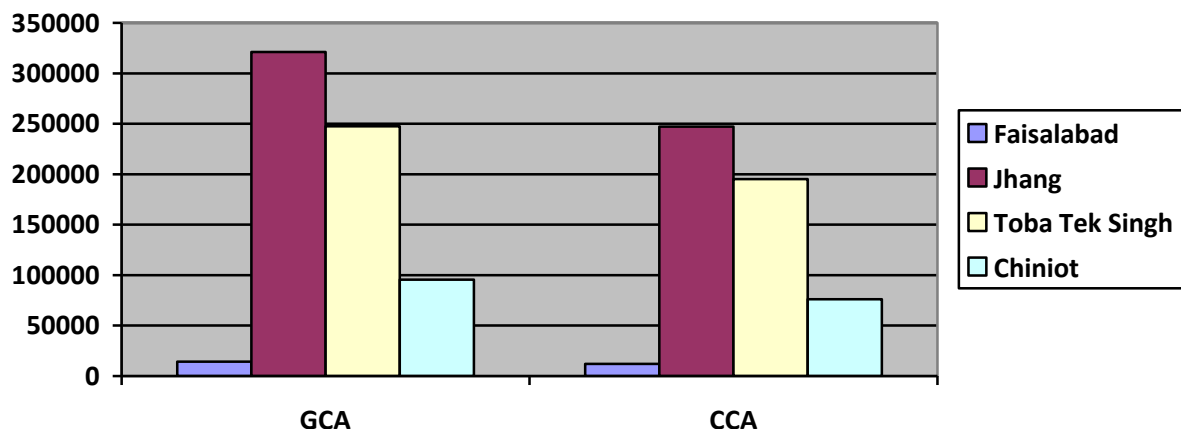
DISTRICT WISE AREA IN JHANG DIVISION

Districts	GCA	CCA
Faisalabad	14290	11908
Jhang	321241	247089
T.T Singh	247365	195197
Chiniot	95593	76172
Jhang Canal Division	678489	533366

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1.1 LOCATION:

THATTA MAHLA BUND

This Bund was constructed during the year 1950 to check the spill of River Chenab upstream Revaz Bridge entering Jhang City and adjoining abadies. This Bund starts from 16th Kilometer of Jhang Chund Railway line and terminates at RD: 126+000 of Sultan Pakhra Disty: Total length of the Bund is 10.20 Miles with its Zero at Railway Line.

JHANG FLOOD PROTECTION BUND

This Bund is in continuation of left marginal Bund of Trimmu Head Works and was constructed during the year 1950 to check the spill of River Chenab downstream Revaz Bridge entering Jhang Town and adjoining Abadies. This Bund Save the Main Jhang City. The total length of the Bund is 14.20 miles. Wetting Channel is also exist from RD 0+000 – 15+000.

LOOP BUND

This Bund was constructed by the Irrigation Department in the year 1959 to function as a Second Defense Line to Thatta Mahla Bund in the dangerous reach RD: 1500 to 11500. This Bund has also been renovated during the year 1981-82 with 20' top width and 6.0' free board above H.F.L of 1973. A wetting channel also exists along this Bund.

1.2 GENERAL DESCRIPTION:

THATTA MAHLA BUND

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The Bund was constructed by the Irrigation Department during 1950. The Bund was breached during flood 1973 and caused heavy damages to Jhang Town and other important installations. To improve the parameters of the Bund, it was strengthened and raised so as to provide a free board of 5.00ft above H.F.L of flood 1973. After the experience of floods of 1976, the Government decided to further strengthen the Bund with a free Board of 6.0ft instead of 5.0ft.

WETTING CHANNEL:

Wetting Channel along this Bund exists from RD: 12+000 to 20+000 so as to detect any defects in the Bund before the actual Floods. 2 No. T/Wells at RD: 16+000 and 19+000 each of 0.5 Cs capacities have been installed for filling the wetting channel.

LOOP BUND

This Bund was constructed by the Irrigation Department in the year 1959 to function as a Second Defense Line to Thatta Mahla Bund in the dangerous reach RD: 1500 to 11500. This Bund has also been renovated during the year 1981-82 with 20' top width and 6.0' free board above H.F.L of flood 1973. A wetting channel also exists along this Bund.

JHANG FLOOD PROTECTION BUND

This Bund is a continuation of left marginal Bund of Trimmu Head Works and was constructed during the year 1950 to check the spill of River Chenab downstream Revaz Bridge entering Jhang Town and adjoining Abadies. This also saves Jhang Multan Road from inundation. The total length of the Bund is 14.20 miles.

During the unpredicted Flood of 1973, the water entered from the breaches of Thatta Mahla Bund and Loop Bund after inundating Jhang Town accumulated on country side along this Bund. When the River subsided, the water level in the city side was 4.0; higher than river side. This Bund was cut between RD: 22-33 to release the pressure on the city side. The following improvements in the Bund have been made after the Flood of 1973, 1975, 1976 & 1977.

- (i) Drainage culverts with sluice valves have been constructed between RD: 22-33 to drain out rain water and affluent of Jhang Town.
- (ii) Old T/Wells crossings have been replaced with R.C.C. pipe crossings fitted with sluice valves.

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- (iii) During the Floods of 1975 and 1976, seepage occurred between RD: 25-27, 39-41 and 45-48 and sloughing of slopes were noticed. A pushta to cover the Hydraulic Gradient has since been provided in these reaches.
- (iv) During flood 2014, breach occurred between RD 1+000 to 2+000 of Jhang Flood Protection Bund, which was restored to its original design.

More over the Khairwala Main Drain takes right hand turn opposite RD: 29000 of Jhang Flood Protection Bund and outfalls into River Chenab. During the Flood of even medium intensity, the water flows back into the drain and flows down in depression along Flood Protection Bund.

During the flood 1997 a heavy flow had been flowing in the toe of the Bund. Village Road bridge opposite RD: 27-28 of Jhang Flood Bund has been constructed by union council No. 13 under Matching Grant Scheme.

The bridge was constructed with a very tight waterway of only 24ft in the Channel of 250ft wide. Inclination of bridge at 42 degree with Flood Bund alignment results in jet like passage of water through Bridge and directly hits to Flood Bund.

During flood season 2014 an unprecedented / exceptionally high flood generated at Maralla Headworks with peak discharge of 861464 Cusecs at 20:00 hours on 06.09.2014 against 838990 cusecs during 1992. At Khanki Head works, a discharge of 947099 Cusecs passed on 07.09.2014 at 08:00 hour against 864000 Cusecs during 1973 and 910512 cusecs during 1992. At Qadriabad 903540 Cusecs discharge passed on 07.09.2011 at 11:00 hours against 854000 Cusecs during 1973 and 948446 cusecs during 1992.

A parallel flow was observed from RD: 47+500 to RD: 0+000 and the water level rose abnormally high due to unprecedented flood in River Chenab. Jhang city was under serious threat during flood 2014 due to insufficient design criteria. The Jhang by-pass road has been constructed at the top of Jhang Flood Bund from RD 18+000 to 52+500 and the river side slope is badly short in this reach i-e 1:1 against 3:1 which is alarming situation for such an exceptionally high flood.

In view of the sensitivity of site and protection of Jhang city, raising of Jhang Flood Protection Bund by 2 ft alongwith stone pitching from RD 18+000 to 56+500 is necessary to avoid any untoward situation in future. The strengthening of flood bunds has been executed by PIU. The following work executed by the PIU.

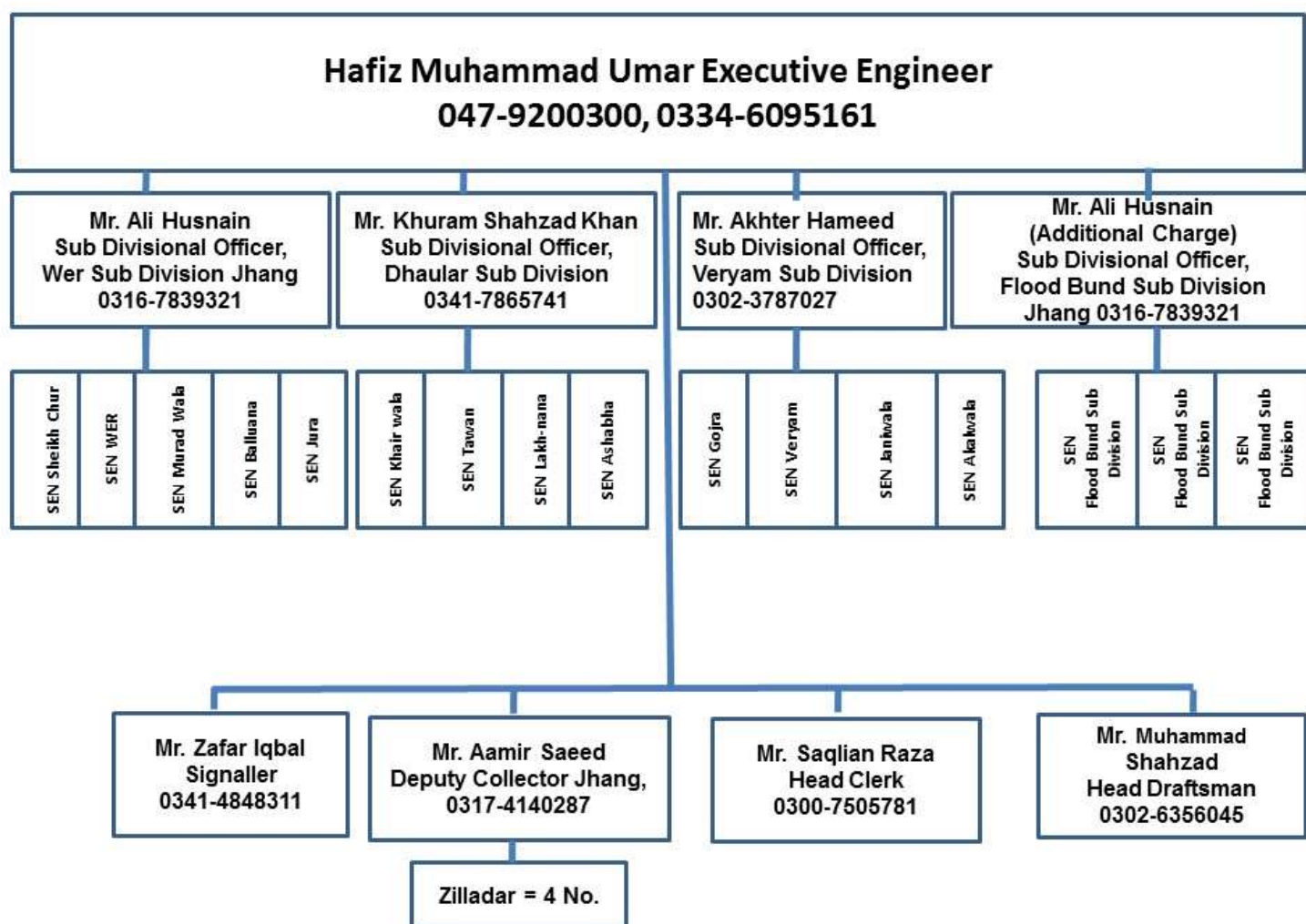
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	Jhang Flood Protection Bund	
1.	Strengthening of Jhang Flood Protection Bund	RD 0+000 to RD 71+000
2.	Pitching & stone Apron	RD 23+000 to 26+900, RD 44+000 to 48+500
3.	Pumping Station	3 No. (4+000, 8+000, 13+000)
	Thatta Mahla Flood Bund	
1.	Strengthening of Thatta Mahla Flood Bund	RD 0+000 – RD 51+000
2.	Sheet Piling	RD 0+000 - RD 12+000
3.	Pumping Station	2 No. (RD 16+000, RD 19+000)

1.3 ADMINISTRATIVE SETUP OF JHANG DIVISION.



Chapter-2

Flood Protection and River Training Works

2.1 DESIGN PARAMETERS OF TRAINING WORKS

DETAIL OF FLOOD PROTECTION BUNDS

1.	Thatta Mahla Bund.	RD: 0-51000 (About 10.2 miles)
2.	Loop Bund	RD: 0-11500 (About 2.3 miles)
3.	Jhang Flood Protection Bund	RD: 0-71000 (About 14.2 miles)
	Total Length	26.70 Miles

DESIGN PARAMETER OF FLOOD BUNDS

Sr. No.	Name	Length	Top Width	Side Slopes		Free Board
				River Side	Country Side	
1	Thatta Mahla Bund	RD:0-51000 (10.20 Miles)	i.0-31 = 25ft ii.31-51 = 25ft	3:1	2:1	6ft
2	Jhang Flood Bund	RD:0-71000 (14.20 Miles)	i. 0-15 =25ft ii. 15-64=25ft iii.64-71=25ft	2:1 3:1 3:1	2:1 2:1 2:1	6ft
3	Loop Bund	RD:0-11500 (2.30 Miles)	20ft	3:1	2:1	6ft
	Mileage	26.70 Miles				

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2.2 LOCATION MAP

Part Index Plan attached showing Flood Bunds at page 56.

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Chapter-3

BRIEF HISTORY OF PAST FLOOD EVENTS

As a consequence to exceptionally high Floods in river Chenab, Thatta Mahla Bund, main protection Line for Jhang city breached during the night between 11-12 August, 1973. The gauge at RD: 1+500, of Thatta Mahla Flood Bund recorded at the time of breach was 526.90 ft against the previous highest level ever recorded as 525.90 ft during Floods of 1957. The total length of breach occurred in the bund was 2155 ft during 1973 with an approximate discharge of 80,000 Cs: passed through the breach when the gauge recorded at Revaz Bridge was 522.70 ft against the highest ever recorded 522.20 ft during 1957.

The peak discharges passed through the river Chenab at critical gauge site at RD.1500 of Thatta Mahla flood Bund are as under.

Sr.No.	Year	Date of Peak Flood at Trimmu H/W	Discharge at Trimmu Head Works	Date	Gauge RD 1+500 of Thatta Mahala Bund	Duration
1	1973	15.08.73	666910	15.08.73	526.90	
2	1974	17.07.74	150170	-	-	-
3	1975	20.07.75	458247	-	-	-
4	1976	10.08.76	704633	10.08.76	525.20	-
5	1977	19.07.77	293628	-	-	-
6	1978	20.07.78	286806	-	-	-
7	1979	17.07.79	168680	-	-	-
8	1980	17.07.80	182081	-	-	-
9	1981	31.07.81	306171	29.07.81	521.80	8-12 Hrs
10	1982	04.08.82	135522	-	-	-
11	1983	05.09.83	272781	-	-	-
12	1984	31.08.84	150608	-	-	-
13	1985	11.08.85	277512	21.07.85	520.90	6-12 Hrs
14	1986	08.08.86	403187	31.07.86	520.50	1-10 Hrs
15	1987	14.06.87	157613	-	-	-
16	1988	29.09.88	493123	29.09.88	524.50	4-5 Hrs
17	1989	03.08.89	481517	2-3.08.89	521.10	21-03 Hrs
18	1990	24.03.90	207396	-	-	-
19	1991	16.04.91	207026	-	-	-

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Sr. No.	Year	Date of Peak Flood at Trimmu H/W	Discharge at Trimmu Head Works	Date	Gauge RD 1+500 of Thatta Mahala Bund	Duration
20	1992	13.09.92	683117	13.09.92	524.35	16-19 Hrs
21	1993	14.07.93	326744	-		
22	1994	23.07.94	323099	-		
23	1995	01.08.95	129561	31.07.95	525.95	15-21 Hrs
24	1996	27.08.96	543708	27.08.96	527.00	4-6 Hrs
25	1997	01.09.97	677417	30.08.97	525.40	5-10 Hrs
26	1998	13.07.98	148668	-	-	-
27	1999	22.07.99	61476	-	-	-
28	2000	26.07.2000	116179	-	-	-
29	2001	18.08.2001	72431	-	-	-
30	2002	17.08.2002	108627	-	-	-
31	2003	07.08.2003	122805	-	-	-
32	2004	21.08.2004	42756	-	-	-
33	2005	17.07.2005	162097	11.07.05	522.40	9-13 Hrs
34	2006	07.09.2006	266270	06.09.06	523.60	18-21 Hrs
35	2007	16.03.2007	173529	-	-	-
36	2008	04.08.2008	132220	-	-	-
37	2009	21.08.2009	62265	-	-	-
38	2010	10.08.2010	323026	10.08.2010	522.50	15- 19-Hrs
39	2011	20.09.2011	132890	-	-	-
40	2012	07.08.2012	82794	-	-	-
41	2013	20.08.2013	272609	19.08.2013	525.40	07-13 Hrs
42	2014	11.09.2014	626006+ 77000	09.09.2014	528.10	06-07 Hrs
43	2015	29.07.2015	150570	-	-	-
44	2016	10.08.2016	166139	10.08.2016	520.80	1.00 Hrs
45	2017	21.07.2017	92595	-	-	-
46	2018	16.08.2018	94680	-	-	-
47	2019	22.08.2019	105821	-	-	-
48	2020	01.09.2020	196077	-	-	-
49	2021	31.07.2021	123167	-	-	-
50	2022	18.08.2022	129815	-	-	-
51	2023	25.07.2023	125186	-	-	-
52	2024	19.08.2024	96280	-	-	-

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During 1976, a maximum discharge of 706442 cusec passed through Trimmu Barrage. A maximum gauge of 525.20 was recorded at RD: 1500 Thatta Mahla Bund on 09.08.1976 at 05:00 Hours with corresponding gauge 521.50 of Revaz Bridge and 506.80 at RD: 23000 of Flood protection Bund. There was damage to top and slope of bund due to heavy rains and wave action during Floods of 1976. All necessary repairs were carried out at site after Floods of 1976. There was no appreciable Flood in the River during the year 1977, 1978, 1979 and 1980. During 1981, the maximum discharge passing downstream Khanki was 5.47 Lac cusec on 26.08.1981, Qadirabad 5.79 Lac cusec on 26.07.1981 and at Trimmu 3.06 Lac cusec on 31.07.1981. The maximum gauge along Jhang Flood Protection Bund at RD: 23000 was 502.00 on 30.07.1981. There was no Flood during 1982 and 1983.

During 1985, the maximum discharge passed D/S Khanki was 309068 Cs. on 07.08.1985, Qadirabad 318117 Cs. on 08.08.1985 and Trimmu 277512 Cs. on 11.08.1985. The corresponding gauge at Revaz Bridge was 519.10 on 11.08.1985. The gauge at RD: 23000 Jhang Flood Protection Bund was 503.60 on 22.07.1985. During 1986, the maximum discharge passed D/S Khanki was 3,26,000 Cs. on 28.07.1986 at 09:00 hours, Qadirabad 312862 Cs. on 28.07.1986 at 12.00 hours. The maximum discharge D/S Rasul Barrage was recorded as 141404 cs: on 05.08.1986 at 06.00 hours. The accumulated effect of Rasul and Qadirabad was received at Trimmu on 08.08.1986 at 04.00 hours and was recorded as 403187 Cs. The maximum gauge recorded at Revaz Bridge was 518.40 and corresponding gauge at RD; 1500 T.M Bund was 521.10 and that of RD: 23000 of J. F.P Bund was 502.90.

During 1987, Maximum Discharge D/S Khanki was 98745 Cs. on 27.07.1987. The peak gauge at Revaz Bridge was 516.70 Cs. on 29.07.1987. However the Flood water did not touch the Bunds during 1987. During 1988 maximum discharge D/S Khanki was 864220 Cs. on 26.09.1988 at 12.00 hours and D/S Qadirabad 892299 Cs. on 26.09.1988 at 16.00 hours and D/S Trimmu 993123 Cs. on 29.09.1988 at 17.00 hours. The maximum gauge recorded at Revaz Bridge was 521.20 on 29.09.1988 at 5.00 hours and gauge at RD: 1500 T.M Bund was 524.50 on 29.09.1988 at 4.00 hours and that of RD: 23000 F.P Bund was 505.10 on 29.09.1988. The Flood water touched the bunds and parallel flow caused damages to the slopes of Jhang F.P Bund. A jet like water flow passing through bridge opposite RD: 27-28 J.F.P Bund also caused serious damage to the Bund.

During 1989, there was very high flood in River Chenab. Peak discharge of 512205 Cs. on 31.07.1989 at 2.00 hours to 5.00 hours was recorded at Khanki and same reached Qadirabad on the same day at 16.00 hours with maximum discharge of 547400 Cs. This very high flood showed Peak discharge of 431517 Cs. at Trimmu Barrage with duration of 6.00 hours to 13.00 hours on 03.08.1989 and maximum gauge at Revaz Bridge was recorded 519.40 on 02.08.1989 at 23.00 hours for 2.00 hours duration. Flood water touched the T.M Bund & J.F.P Bund on 31.07.1989 at 9.00 hours/5.00 hours respectively. The Flood water resulted maximum gauge along T.M flood Bund RD: 1500 as 521.00 on 03.08.1989 & J.F.P Bund RD: 23000 gauge 505.75 on 02.08.1989.

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During 1990 there was very high flood in the River Chenab Peak and a discharge of 160760 Cs was observed on 10.09.1990 at 12.00 hours at Khanki and Qadirabad respectively and peak discharge of 151584 Cs at Trimmu Head Works on 12.09.1990 at 12.00 hours. During 1991 there was high flood in River Chenab with peak discharge of 103878 and 120469 Cs. on 14.07.1991 at 6.00 A.M at Khanki Head & Qadirabad Barrage respectively and peak discharge of 161471 Cs. on 24.07.1991 at 6.00 A.M at Trimmu Barrage. The flood water showed the maximum gauge at Revaz Bridge as 518.00.

During 1992, maximum discharge of 910512 Cs passed D/S Khanki on 11.09.1992 at 21.00 hours and D/S Qadirabad 948446 Cs. on 11.09.1992 at 04.00 hours. The maximum gauge recorded at Revaz Bridge was 520.30 on 13.09.1992 at 19.00 hours and gauges observed at RD: 1500 T.M Bund were 524.35 on 13.09.1992 at 16.00 hours and that of RD: 23+000 J. F.P Bund 506.75 on 13.09.1992 at 01:00 hours . The Flood water touched the bunds and parallel flow caused damages to the slopes of Jhang F.P Bund.

During 1996, on 23.08.1996 maximum flood of 851223 Cs. was observed down stream QBD Barrage at 5.00 A.M and raised up to 853231 at 10.00 A.M with Revaz Bridge gauge 518.00 & 518.20 respectively. The maximum effect was received on 27.08.1996 at Revaz Bridge. The4 maximum gauge observed 522.60 and gauge at RD: 1500 of Thatta Mahla Flood Bund was received 527.00 at 2.00 am. This position remained constant up to 7.00 A.M and breaching section was not operated. After 7.00 am, gauge at RD: 1500 T.M.F.B went down slowly.

During flood 1997 on 28.08.1997 high flood of 873442 Cs. passed down stream Qadirabad Barrage at 17.00 hours and remained constant up to 22.00 hours. The maximum accumulated effect was received 30.08.1997, at Revaz Bridge at 24.00 hours. The maximum gauge at Revaz Bridge was observed 521.21 and maximum gauge at RD: 1500 of Thatta Mahla Bund was noted on 31.08.1997 at 5.00 AM. This maximum gauge level 525.40 remained constant up to 10.00 AM. After 10.00 A.M, the gauge at RD: 1500 of Thatta Mahla Bund went down slowly. No flood was received during 2003-2004.

During 2005, River Chenab received flood at Maralla on 07.07.2005 at 15:00 hours with its peak at 24:00 Hours with a discharge of 333744 Cs. Khanki Head Works started raising on 07.07.2005 at 22:00 Hours and flood water reached to high flood with its peak discharge of 368078 Cs at 10.00 Hrs on 08.07.2005. River Chenab came into low flood at Qadirabad Head Works on 07.07.2005 at 22:00Hrs and turned to medium flood with peak discharge of 369847 Cs at 17:00Hrs on 08.07.2005. Similarly rising of flood water at Chiniot Bridge started on 09.07.2005 at 14:00 Hours and level fell down with 263200 Cs from 15:00Hrs on 09.07.2005 to 23:00Hrs and it again raised with discharge 282000 at 24:00Hrs on 09.07.2005 to peak of 295800 Cs. up to 7:00Hrs on 10.07.2005. The gauge at Revaz Bridge raised from 516.80 at

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5:00Hrs on 09.07.2005 to 520.30 at 4:00Hrs on 11.07.2005. With the rising of gauge at Revaz Bridge, water spilled out from river and travelled on left side towards T.M.B parallel to Railway Line and hit T.M.B at R.D 1500 at 4:00Hrs on 10.07.2005. The flood water effect reached at Trimmu Head Works with peak discharge of 171137 Cs.

During year 2006, River Chenab received high Flood on 03.09.2006, at Marala with discharge of 332950 Cs. Khanki Head Works raised and reached to high flood on .4.9.06 at 9.00 Hrs with its peak discharge of 418740 Cs. River Chenab came into high flood at Qadirabad Barrage on 4.9.06 on 14.00 Hrs with peak discharge of 432206 Cs. Flood water at Chiniot Bridge started raising on 5.9.06 and falling with 309600 Cs discharge on 5.9.06 at 23.00 Hrs. With the raising of gauges at Revaz bridge, the water spilled out from the river on left side towards T.M.B parallel to Railway Line and hit T.M.B at RD: 1500. The flood water reached at Trimmu Head Works with peak discharge of 266270 Cs on 7.9.2006 at 16.00 Hrs.

There was heavy rain fall in the catchment area of River Chenab during the month March, 2007 resulting high Flood at Marala Head works with peak discharge 252409 Cs on 13.03.2007 at 15 Hours, simultaneously at Khanki on 13.03.2007 at 17:00 Hours with Peak discharge of 3,00 197 Cs. River Chenab raised at Qadirabad Barrage with peak discharge of 3,12,836 Cs on 13.03.2007 at 21:00 Hrs. This Flood water reached at Trimmu Headworks on 15.03.2007 at 6.00 Hrs with discharge of 156882 Cs.

During the year 2007, River Chenab received a maximum discharge of 83867 Cs at Qadirabad Barrage on 1.07.2007 at 6.00 Hrs which passed through Trimmu Barrage with max discharge of 62421 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2008, River Chenab received a maximum discharge of 125317 Cs at Qadirabad Barrage on 04.08.2008 at 6.00 Hrs which passed through Trimmu Barrage with max discharge of 67836 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2009, River Chenab received a maximum discharge of 77535 Cs at Qadirabad Barrage on 19.06.2009 at 6.00 Hrs which passed through Trimmu Barrage with max discharge of 72625 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2010, River Chenab received a maximum discharge of 319733 Cs at Qadirabad Barrage on 07.08.2010 at 3.00 Hrs which passed through Trimmu Barrage with max discharge of 222204 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

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During the year 2011, River Chenab received a maximum discharge of 170547Cs at Qadirabad Barrage on 17.09.2011 at 12.00 Hrs which passed through Trimmu Barrage with max discharge of 132890 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2012, River Chenab received a maximum discharge of 180789Cs at Qadirabad Barrage on 05.08.2012 at 11.00 Hrs which passed through Trimmu Barrage with max discharge of 82794 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2013, River Chenab received a maximum discharge of 403403 Cs at Qadirabad Barrage on 15.08.2013 at 18.00 Hrs which passed through Trimmu Barrage with max discharge of 272609 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2014, River Chenab received exceptionally High flood with maximum discharge of 904285 Cs at Qadirabad Barrage on 07.09.2014 at 11.00 Hrs which passed through Trimmu Barrage with max discharge of 626006 Cs the through Barrage and 77000 Cs through Breaching section. Jhang Flood Protection Bund of Jhang Canal Division L.C.C (W) Jhang breached / damaged in between RD 1+000 to 2+000 on 10.09.2014 at 01:40 hours.

The water level at Rivaz Railway Bridge during 1973 Flood was recorded 522.60 that raised upto 524.90 on 09.09.2014 at 06:00 hours (Difference 2.30 ft). Water level at RD 1+500 Thatta Mahalla Flood Bund raised upto 528.10 on 09.09.2014 at 06:00 hours against HFL of 1973 i.e., 526.90 ft. (Difference 1.20 ft). Danger Flood mark at RD: 23+000 of Jhang Flood Protection Bund is 508.00 and water level raised upto 510.30 on 09.09.2014 at 23:00 hours. (Difference 2.30 ft). At RD 6+000 Jhang Flood Protection Bund, designed Highest Flood Level (HFL) is 506.79 where as water level raised to 508.80 on 09.09.2014 at 24:00 hours (Difference 2.01 ft).

During the year 2015, River Chenab received a maximum discharge of 161054 Cs at Qadirabad Barrage on 13.07.2015 at 10.00 Hrs which passed through Trimmu Barrage with max discharge of 150570 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2016, River Chenab received a maximum discharge of 405542 Cs at Qadirabad Barrage on 08.08.2016 at 3:00 Hrs which passed through Trimmu Barrage with max discharge of 166139 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2017, River Chenab received a maximum discharge of D/S Qadirabad Barrage was 164660 Cs at 13:00 and remain same upto 14:00 on 19.07.2017 at 2:00 Hrs which passed through Trimmu Barrage with max discharge of 92595 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

Sub Engineer

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Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

During the year 2018, River Chenab received a maximum discharge of D/S Qadirabad Barrage was 172031 Cs at 6:00 and remain same upto 13:00 on 14.08.2018 at 24:00 Hrs which passed through Trimmu Barrage with maximum discharge of 94680 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2019, River Chenab received a maximum discharge of D/S Qadirabad Barrage was 131899 Cs at 9:00 and remain same upto 12 :00 on 15.08.2019 at 3:00 Hrs which passed through Trimmu Barrage with max discharge of 105821 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2020, River Chenab received a maximum discharge of D/S Qadirabad Barrage was 267540 Cs at 15:00 and remain same upto 20 :00 on 28.08.2020 at 5:00 Hrs which passed through Trimmu Barrage with max discharge of 206077 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2021, River Chenab received a maximum discharge of D/S Qadirabad Barrage was 187812 Cs at 6:00 and remain same upto 18 :00 on 29.07.2021 at 5:00 Hrs which passed through Trimmu Barrage with max discharge of 123167 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2022, River Chenab received a maximum discharge of D/S Qadirabad Barrage was 193577 Cs at 15:00 and remain same upto 17:00 on 12.08.2022 at 15:00 Hrs which passed through Trimmu Barrage with max discharge of 129815 Cs without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2023, River Chenab received a maximum discharge of D/S Qadirabad Barrage was 185749 Cs at 09:00 and remain same upto 12:00 on 20.07.2023 at 9:00 Hrs which passed through Trimmu Barrage with max discharge of 125186 Cs on 25.07.2023 at 21:00 without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

During the year 2024, River Chenab received a maximum discharge of D/S Qadirabad Barrage was 168995 Cs at 02:00 and remain same upto 15:00 on 16.08.2024 at 12:00 Hrs which passed through Trimmu Barrage with max discharge of 96280 Cs on 19.08.2024 at 12:00 without damaging to the Flood Protection Bunds of Jhang Canal Division L.C.C (W) Jhang.

Sub Engineer

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Flood Bund Sub Division
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Jhang Division LCC(W)
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CHAPTER-4

DESIGN DATA, HISTORIC PEAK FLOOD DATA AND PREVIOUS FIVE YEARS FLOOD DATA OF HEAD WORKS / BARRAGES AND OTHER CONTROL POINTS

4.1 FLOOD LIMITS

The terminology of different kinds of flood is low, Medium, High, very high and exceptionally high and they will be taken as such in the light of any wireless message received from respective warning centers.

FLOOD LIMIT	TRIMMU	QADIRABAD	RASUL
1. Low	1.50 to 2.00 Lac	1.00 Lac	0.75 Lac
2. Medium	2.00 to 3.00 Lac	1.50 Lac	1.10 Lac
3. High	3.00 to 4.50 Lac	2.00 Lac	1.25 Lac
4. Very High	4.50 to 6.00 Lac	4.00 Lac	2.23 Lac
5. Exceptionally High	Above 6.00 Lac	6.00 Lac & Above	Above 3.00 Lac

4.2 TIME LAGS OF FLOODS

As per statement, the following are the time lags for average flood flows in the Rivers

RIVER	SITE	DESIGNED CAPACITY	DISTANCE IN K.M.	TIME LAG IN HOURS
Chenab	Marala	11.00 Lac	-	-
	Khanki	11.00 Lac	56	9
	Qadirabad	9.00 Lac	30	6
	Chiniot Bridge		101	38
	Revaz Bridge		80	16
	Trimmu	8.75 Lac	34	10
	Panjnad	7.00 Lac	257	81

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4.3 **HIGHEST FLOODS**

The highest flood discharges in cuses recorded upstream Trimmu Head Works and gauge at Thatta Mahalla Flood Bund RD: 1+500 during last Ten years are as under:-

Sr. No.	Year	Date of Peak Flood at Trimmu H/W	Discharge at Trimmu Head Works	Date	Gauge RD.1+500 of Thatta Mahalla Bund	Duration
1	2012	07.08.2012	82794	-	-	-
2	2013	20.08.2013	272609	19.08.2013	525.40	07-13 Hrs
3	2014	10.09.2014	626006 +73000	09.09.2014	528.10	06-07 Hrs
4	2015	29.07.2015	150570	-	-	-
5	2016	10.08.2016	166139	10.08.2016	528.10	1.00 Hrs
6	2017	21.07.2017	92595	-	-	-
7.	2018	16.08.2018	94680	-	-	-
8.	2019	22.08.2019	105821	-	-	-
9.	2020	01.09.2020	206077	-	-	-
10.	2021	31.07.2021	123167	-	-	-
11	2022	18.08.2022	128915	-	-	-

4.4 **PEAK DISCHARGE**

Year	Khanki Barrage			Qadirabad Barrage			Trimmu Barrage		
	Date	Time	Discharge	Date	Time	Discharge	Date	Time	Discharge
1	2	3	4	5	6	7	8	9	10
1973	8-Oct	6.12	864000	8-Oct	6.12	854000	8-Dec	16.12	611972
1974	24/7	24.00	196076	25/7	6.00	19828	27/7	02.00	150172
1975	17/7	12.00	660680	17/7	18.00	669819	21/7	05.00	458247
1976	17/07	12	666241	17/07	17.18	669819	20/07	17	458247
1977	8-Jul	2	586453	8-Jul	8	608057	8-Oct	2	706433
1978	8-Sep	14	433095	8-Sep	22.24	428009	8-Dec	17.52	238042
1979	8-Mar	-	246868	8-Mar	-	245566	8-May	-	269584
1980	15/07	6	128209	15/07	6	122166	17/07	12	183681
1981	26/07	21	546505	26/07	19	578968	31/07	2.04	306171
1982	8-Feb	3	256010	25/07	12	221777	27/07	12	138532
1983	8-Sep	20	303913	8-Sep	6	283227	8-Sep	6	276988

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Year	Khanki Barrage			Qadirabad Barrage			Trimmu Barrage		
	Date	Time	Discharge	Date	Time	Discharge	Date	Time	Discharge
1	2	3	4	5	6	7	8	9	10
1984	8-Dec	6	135855	8-Sep	18	108476	30/08	11	155000
1985	8-Jul	18	309069	8-Aug	6	318118	8-Nov	6	277512
1986	8-May	12	341000	8-May	12	345258	8-Aug	12	403187
1987	27/07	6	98745	27/07	18	77279	30/07	6	98083
1988	26/09	12	88422	26/09	16	892299	29/09	17	93123
1989	31/07	2	612205	29/07	16	547400	8-Mar	6	431517
1990	9-Oct	12	234460	9-Oct	12	243272	9-Dec	12	151584
1991	14/07	6	103870	14/07	6	120429	24/07	6	161471
1992	9-Oct	21	910512	9-Nov	4.08	948446	13/09	21	683117
1993	7-Nov	9	430410	7-Nov	17	443054	13/09	17	335889
1994	20/07	24	425160	21/07	4	425567	23/07	3	303521
1995	27/07	17	604336	29/07	13	644397	8-Dec	-	609561
1996	23/08	5	851269	23/08	10	853231	27/08	16	543708
1997	28/08	12	847650	28/08	to 17.00	873442	9-Jan	to 9.00	677417
1998	10.09.98	6	26832	25/9	6	39780	29/9	6	16876
1999	11.8	6	112147	20/7	6	108190	8-May	6	54856
2000	237	6	268358	24/7	6	190640	26/7	6	116179
2001	24.7	6	131888	8-Aug	6	125483	27/7	6	57211
2002	15.8	6	137210	15/8	6	182170	17/8	6	101855
2003	19/02	18	371788	19/02	22	367408	22/02	5	165169
2004	18/08	6	85101	18/08	6	90043	21/08	6	48173
2005	7-Aug	10	368078	7-Aug	17	369847	17.07/2005	15	162097
2006	4/9/2006	9	418740	4/9/2006	14	432206	7/9/2006	16	266270
2007	1/7/2007	6	72923	1/7/2007	6	83867	2/7/2007	6	173529
2008	4/8/2008	6	123320	4/4/2008	6	103317	4/8/2008	6	132220
2009	-	-	-	16/06/2009	6	77535	21/8/2009	6	62265
2010	07.08.2010	13	327637	7/8/2010	10	319733	10/8/2010	22	323026
2011	19.09.2011	19	171383	17.09.2011	12	170547	20.09.2011	6	132890
2012	05.08.2012	6	176197	05.08.2012	11	180789	07.08.2012	6	82794
2013	15.08.2013	10	410332	15.08.2013	18	403403	20.08.2013	13	272609
2014	07.09.2014	7:00	947099	07.09.2014	11:00	904285	10.09.2014	19:00	626006 +77000
2015	13.07.2015	3:00	155567	13.07.2015	10:00	161054	29.07.2015	15:00	150570
2016	07.08.2016	24:00:00	418736	08.08.2016	3:00	405542	10.08.2016	14:00	166139
2017	19.07.2017	8:00	184346	19.07.2017	13:00	164660	21.07.2017	18:00	92595

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Executive Engineer
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Jhang

Year	Khanki Barrage			Qadirabad Barrage			Trimmu Barrage		
	Date	Time	Discharge	Date	Time	Discharge	Date	Time	Discharge
1	2	3	4	5	6	7	8	9	10
2018	13.08.2018	12:00	182025	14.08.2018	6:00	172031	16.08.2018	24:00:00	94680
2019	15.08.2019	24:00:00	133613	15.08.2019	9:00	131899	22.08.2019	18:00	105821
2020	28.08.2020	7:00	286230	28.08.2020	15:00	267540	01.09.2020	3:00	206077
2021	29.07.2021	6:00	189683	29.07.2021	6:00	187812	31.07.2021	5:00	123167
2022	12.08.2022	6:00	210945	12.08.2022	15:00	193577	18.08.2022	15:00	129815
2023	20.07.2023	2:00	204041	20.07.2023	09:00	185749	25.07.2023	21:00	125186
2024	16.08.2024	2:00	168995	16.08.2024	09:00	148323	19.08.2024	12:00	96280

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

Chapter-5

FLOOD FIGHTING STRATEGY

DANGEROUS FLOOD MARKS FOR THE BUNDS ARE AS UNDER: -

Name of Bund	Danger Flood Mark	Site or RD of Bund
1. Thatta Mahla Flood Bund	525.00	1500
2. Jhang Flood Protection Bund	508.00	23000

When these gauges are attained at respective sites, the Sub Divisional Officer Flood Bund Sub Division (at Jhang) will issue a warning to the District Administration who will arrange to inform the public to evacuate immediately from the areas identified in this Plan.

The following Flood Bunds, are directly affected by the Floods and Flood spill:-

S.No:	FLOOD BUND/CHANNELS	REACH.	LENGTH.
1.	Jhang Flood Protection Bund	RD:0+000-71+000	14.20 miles
2.	Thatta Mahalla Bund	RD: 0+000-51+000	10.20 miles
3.	Loop Bund	RD: 0+000-11+500	2.30 miles
		Total:	26.70 miles.

For watching of Flood Bunds, one man per mile will be employed for one month i.e. 1st June to 30th September, in addition to existing strength of one man per six mile length. Since there is no regular establishment on Jhang Flood Protection Bund.

Thatta Mahalla Bund , so a gang of one man per mile will be employed on Jhang Flood Protection Bund and one man for Thatta Mahalla Bund will be employed w,e,f, 1st June to 30th September and one mate at every Nine persons.

Sub Engineer

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Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

The establishment will take care of all preparations like filling depressions, rain cuts/gharas, clearance of slopes upto 10 feet beyond toe of Flood Bund, Opening / puddling holes etc.

i. LOW FLOOD DISCHARGE 100000-150000 Cs.

No extra labour will be employed. The labour arranged for preparedness will continue as such. The Sub Engineer Jhang Flood Bund Section will shift his camp at RD: 23+000 Jhang Flood Protection Bund and Sub Engineer Thatta Mahla Flood Bund will also watch Thatta Mahalla Bund at RD: 19+000.

ii. MEDIUM FLOOD DISCHARGE 150,000-200,000 Cs.

The flood water flows within River banks. No extra labour will be employed on Jhang Flood Protection Bund. In case of any emergency, SDO Flood bund Jhang will promptly contact Executive Engineer Jhang and suggest/take fighting measures with prior concurrence of Superintending Engineer LCC(west), Circle Faisalabad. He will keep a close liaison with Flood Center of District Coordination Officer Jhang and Flood Emergency Officer of Faisalabad Irrigation Zone Faisalabad.

iii. HIGH FLOOD DISCHARGE 200000-400000 Cs.

The flood water spills out during this stage of flow and a gang of two men per mile per shift for three shifts will be employed on Flood Bunds whereas the labour strength of 2 men per mile per shift will be employed on Jhang Flood Protection Bund, Thatta Mahla bund and Loop bund. The Sub Engineer Jhang Flood Bund will shift his camp at Jhang Flood Protection Bund at RD: 6+000 and of Thatta Mahalla Flood Bund at RD: 11+500, The Sub Divisional Officer Flood Bund Jhang will be overall in-charge of flood watching and related activities. In Medium to high flood stage 07No. excavator, 2 No. Dozer, 14 No. Trolleys / Dumpers, 14 No. Tractor with front blade & 70 No. Labour (Beldar & Mate) required.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
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Executive Engineer
Jhang Division LCC(W)
Jhang

iv. VERY HIGH FLOOD DISCHARGE 400000-600000 Cs.

All activities will remain as such. The watching establishment will be raised to three men per mile per shift for three shifts on Jhang Flood Protection Bund & Thatta Mahalla Flood Bund. In high to very flood stage 07No. excavator, 2 No. Dozer , 14 No. Trolleys / Dumpers , 16 No. Tractor with front blade & 80 No. Labour (Beldar & Mate) required.

v. EXCEPTIONALLY HIGH FLOOD ABOVE 600000 Cs.

This stage warrants alarming situation. The watching labour will be raised to 5 men per mile per shift for three shifts on Flood Bund. Similarly the strength will be raised to six men per shift on Jhang Flood Protection Bund and three men per shift for three shifts on Thatta Mahalla Bund On receipt of exceptionally high flood, the Deputy Collector Jhang along with concerned Zilladars will shift their camp at Jhang Canal Rest House. He will arrange,

- i. Proclamation on loudspeakers etc for evacuation of abadies inside the flood bunds.
- ii. Prepare maps for the areas inundated and carry out immediate survey for damages to crops and other properties.
- iii. Keep a close liaison with Sub Divisional Officer and assist him in procurement of labour and other camping arrangements.

Executive Engineer, Jhang Division will camp at Jhang Canal Rest House and will be overall in charge of all watching and Flood fighting activities. He will remain in touch with District Administration Jhang and Flood Emergency Officer, Jhang. He will launch Flood fighting activities with Consultation/Concurrence of Superintending Engineer, LCC(West), Circle Faisalabad. In very high to Exceptionally high flood stage 07No. excavator, 2 No. Dozer , 14 No. Trolleys / Dumpers , 21 No. Tractor with front blade & 94 No. Labour (Beldar & Mate) required.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

CHAPTER-6

FLOOD DAMAGES RESTORATION WORKS

There are no flood damage restoration works under execution in Jhang Canal Division LCC(W), Jhang for the year 2024.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

CHAPTER-7

FLOOD FIGHTING WATCHING ARRANGEMENT

The flood season which is generally from June to September every year, demands strict watching of flood bunds. Thus to meet with emergency and necessity of watching, work charge establishment will be employed from 01.07.2025 to 30.09.2025, Furthermore, during receipt of flood and keeping in view the situation of flood, civil administration also provides labour of District Council, Town Committee and also from the other Departments for the purpose of close watching on the Flood Bunds.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

7.1 **PRE –FLOOD ARRANGEMENTS**

SCHEDULE OF FLOOD PREPAREDNESS ACTIVITIES FOR FLOOD SEASON 2025.

Sr.#	Activity	Target Dates	Achievements
I.	Preparation of Flood Fighting Plans.		
	a) Submission of Draft Divisional Plans By Zonal Chief to Chief Engineer Drainage and Flood (after Scrutiny by S.E / C.E).	01.03.2025	Flood Fighting Plan has been prepared and cleared from the Chief Engineer, Drainage & Flood Zone, Lahore and will be circulated to all concerned Departments soon.
	b) Review by Chief Engineer D&F	31.03.2025	
	c) Final submission of Divisional Plans.	15.04.2025	
II	Inspection of Flood Works		
	a. By Executive Engineer	15.03.2025	
	b. Checking Inspection by S.E / C.E	31.03.2025	
	c. Inspection by the Departmental Army Team	31.03.2025	
III	Identification of Encroachments on Bunds and spurs to the Civil Administration	31.03.2025	
IV	Painting Gauges, RD Marks , Data Boards and Repairs to Flood Bund etc.	31.05.2025	Will be completed before 31.05.2025.
V	Replenishment of Reserve Stock of Stone and Flood Fighting Materials		
	a) Identification of needs	28.02.2025	There is no sanction reserve stock of stone, however 423.411 %Cft Reserve stock of Stone received from PIU during Remodeling of Jhang Flood Protection Bund & Thatta Mahla Flood which is sufficient.
	b) Funding procurement Arrangements	15.03.2025	
	c) Procurement, stacking, Prescribed Field checks	31.05.2025	
VI	Installation of Wireless Sets	15.06.2025	Will be installed on 15.06.2025
VII	Opening of Zonal Flood Cells		
	a) Duty Roster	01.06.2025	Will be notified before 01.06.2025
	b) Operative	15.06.2025	Will be made operational from 15.06.2025.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

A) UPTO DATE STATUS OF RESERVE STOCK OF STONE

Sanctioned Stock of Stone	Available Quantity	Defected Quantity	Remarks
Nil	423.411 % Cft	-	Reserve stock of Stone received from PIU Jhang Canal Division after completion work Remodeling of selected reaches Jhang Flood Protection Bund & Thatta Mahla Flood Bund. .

B) UPTO DATE STATUS OF RESERVE STOCK OF STONE DETAIL STRUCTURE WISE.

Sr. No.	Name of structure	Sanctioned Quantity	Available Quantity (% Cft)	Balance Quantity	Remarks
1.	Jhang Flood Protection Bund RD 5+000	-	231.69 % Cft	-	Reserve stock of Stone received from PIU Jhang Canal Division after completion work Remodeling of selected reaches Jhang Flood Protection Bund & Thatta Mahla Flood Bund.
2.	Thatta Mahla Flood Bund RD 12+000	-	191.72 % Cft	-	

7.2 WATCHING ESTABLISHMENT

Following are the main spots where watching Huts will be established on Flood Bunds, the tents/chouldaries will be erected on Flood Bunds. Watching material will be shifted in such huts. One Chowkidar for each Hut will be employed from the report of receipt of medium Flood and will remain employed till end of flood season.

Sr.#	Name of Bunds	Site	Flood Limits									
			Low		Medium		High		Very High		Exceptionally High	
			Man	Shift	Man	Shift	Man	Shift	Man	Shift	Man	Shift
1	Jhang flood protection bund	RD6+000	-	-	9	3	18	3	22	3	26	3
		RD 23+000	-	-	9	3	18	3	22	3	26	3
2	Thatta Mahla flood bund	RD 1+500	-	-	9	3	18	3	22	3	26	3
		RD 11+500	-	-	9	3	18	3	22	3	26	3

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

7.3 ARRANGEMENT AT SENSITIVE SITES

After completed work by PIU Remodeling Selected Reaches of Jhang Flood Protection Bund & Thatta Mahla Flood Bund there is no sensitive site location on flood bunds.

7.4 WATCHING MATERIAL

There will be total 06 No. watching Camps along Flood Bunds: 03 No. on Jhang Flood Protection Bund and 2 No. Thatta Mahla Flood Bund. The following Flood material will be arranged and stored at Canal Colony Jhang and Thatta Mahla Flood Bund. The material will be shifted to watching huts as soon as the intimation of Medium / High Flood limit is received. The medium flood limit applies to Thatta Mahalla Flood Bund and High Flood limit for Jhang Flood Protection Bund. Following will be the scale of watching material for temporary watching camps / huts.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

LIST OF WATCHING MATERIAL REQUIRED FOR WATCHING CAMPS

Sr. No.	Name of Item	Unit	Total Required Quantity	Available Quantity	Required Quantity	Remarks
1	Axes	No.	80	-	80	Required flood fighting material will be purchased before 30.06.2025
2	Bamboos 8' to 10' (for Lighting arrangements)	No.	904	-	904	
3	Chouldaries	No.	5	-	5	
4	E.G. Bags	No.	4500	-	4500	
5	Folding Chair	No.	24	-	24	
6	Folding Table	No.	4	-	4	
7	G.I. Buckets	No.	100	-	100	
8	Generator (8.00 K.Watts)	No.	2	-	2	
9	Hand Saws	No.	4	-	4	
10	Handle for Kassi / Axes	No.	200	-	200	
11	Kassi with Handles	No.	625	-	625	
12	M. Oil	Litter	20	-	20	
13	Manila Rope	Kg	50	-	50	
14	Petrol for Generator	Litter	200	-	200	
15	Steel Charpoy	No.	20	-	20	
16	Torches Chargeable	No.	52	-	52	
17	Umbrella	No.	20	-	20	
18	Cotton bags	No.	47	-	47	
19	Jackets	No.	25	-	25	
20	Polyethene Sheet	Kg	5000	-	5000	

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

7.5 ARRANGEMENT FOR SOUNDING & PROBING

This item relates to barrage / Head works Canal Divisions.

7.6 LIGHTING ARRANGEMENT

Petrol generators, emergency lights, lanterns and torches will be arranged for lighting arrangements.

7.7 RATION ARRANGEMENT

The establishment and supervisory staff will be provided food and water by the Irrigation Departmental arrangement.

7.8 P.O.L. ARRANGEMENT FOR VEHICLES

Civil Administration & Irrigation Department will arrange to supply POL for vehicles.

7.9 TRANSPORTATION

Vehicles are available for transportation during Flood Season.

7.10 LAW AND ORDER

There is no likelihood of any interruption by anyone except cutting of banks of Flood Bund to reduce heading up. In case of necessity, District Coordination Officer Jhang will be contacted by the Executive Engineer, Canal Jhang Division to take decision at site.

7.11 MEDICAL ARRANGEMENT FOR LABOUR

It will be responsibility of Health Department to provide Medical Facilities in flood areas where is required under supervision of Civil Administration.

7.12 LIAISON WITH OTHER DEPARTMENT

Executive Engineer, Jhang Canal Division will keep liaison with the Civil and Army Authorities and will keep the Superintending Engineer LCC Faisalabad, fully apprised of the flood situation in Jhang Canal Division.

7.13 ROLE OF THE ARMY

Role of the Army is very important in case of any emergent position arising due to high flood. A continuous liaison with the Army Authorities will be maintained during flood and if required necessary help will be sought.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

7.14 DUTIES OF TELEPHONE ATTENDANT

The Phone and Cell No of all officers and official to make immediate contact at any emergency during flood as below.

Sr. No	Name of Officer / Official	Telephone No.	Period	Time	
				From	To
1.	(Mr. Hafiz Hamid Khan) Telephone attendant Jhang Canal Division Jhang	047-9200300	15.06.2025 to 15.10.2025	9:00 AM	4:00 PM
2.	Telegraph Office Jhang	047-9200300		9:00 AM	4:00 PM
				4:00 PM	12:00PM
				12:00 PM	9:00AM
3.	(Mr. Ali Husnain) Sub Divisional Officer Flood Sub Division	0316-7839321		24 Hours	
4.	(Mr. Danish Majeed) Sub Engineer Jhang Flood Bund Section	0341-0518828		24 Hours	
4.	(Mr. Zain Murtza) Sub Engineer Thatha Mahla Flood Bund Section	0334-1045325		24 Hours	

7.15 WIRELESS ARRANGEMENTS

Wireless system will be installed w.e.f 01.06.2025 in the vehicle of XEN Jhang No. GAA-888 and Vehicle of SDO Flood Bund No. FDG-1080.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

CHAPTER-8

DETAIL OF ENCROACHMENT

A) DETAIL OF ENCROACHMENT.

Sr. No	Total Critical Encroachments	Removed	Remaining	Remarks
1.	5 No. Houses Jhang Flood Protection Bund at RD 17+000 – 18+000	-	5 No. Houses Jhang Flood Protection Bund at RD 17+000 – 18+000	These are the non-critical encroachments on the slope of Flood Bunds.
2.	2 No. Shops Thatta Mahla Flood Bund at 27+000 .	-	2 No. Shops Thatta Mahla Flood Bund at 27+000 .	

B) DETAIL OF CRITICAL ENCROACHMENT

There is no any Critical encroachment on Flood Bunds.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

CHAPTER-9

DUTY ROSTER/FLOOD FIGHTING PROGRAM

DUTIES OF IRRIGATION STAFF

I) Signallers.

The Canal Telegraph Station at Jhang shall remain open for 24 hours. This station has the following installations for receiving and transmitting the messages.

1. Canal Telegraph System connected Faisalabad.
2. Trunk Telephone No.047-9200300
3. Local Telephone connected with the following points.

- i) Revaz Bridge
- ii) Thatta Mahla Bund RD 1500 and 11500
- iii) Flood Protection Bund RD 23000
- iv) Trimmu Head Works

This station shall remain open for 24 hours during flood emergency days and the following signallers will assist the Signaller at Jhang.

1. Signaller Sheikh Chuhan.
2. Signaller Veryam.
3. Signaller Lakhana.

The work of Sheikh Chuhan and Lakhana Telegraph Offices will be looked after by the Signaller Wer, Bhangu and Ashaba respectively.

The Signaler Sheikh Chuhan, Veryam and Lakhana will be called for duty by Signaller Jhang when the discharge at Qadirabad goes beyond medium flood.

FIELD STAFF

a) **SUB DIVISIONAL OFFICERS**

The Flood Bunds fall in the jurisdiction of Sub Divisional Officer Flood Bund Sub Division with Headquarter at Jhang who under the advice and directions of the Executive Engineer, Jhang will be overall In-charge of all the operations connected with the Flood Bunds. Sub Divisional Officer Veryam and Dhauhar Sub Divisions assist him during flood days, SDO Veryam will be in-charge of all the operations/arrangements on Jhang Flood Protection Bund and Sub Divisional Officer, Dhauhar on Thatta Mahalla Bund. Sub Divisional Officer Veryam shall keep his temporary Headquarter at RD 6+000 of Jhang Flood Protection Bund. SDO Dhauhar will keep his Headquarter at RD 11+500 of Thatta Mahla flood bund. The Sub Divisional Officers shall move for flood duty when Qadirabad records medium flood and is still rising.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

. b) **SUB ENGINEERS AND ZILLADARS**

The Canal is completely closed during flood days. The Sub Engineers from other sections along their Class-IV establishment with their kassies shall move to their duties shown at page 28. They shall also bring their own Gauge Readers, Dak Runners, Artificers and Electricians to assist them in recording and transmitting gauges, removing defects of electric installations and T&P in their respective jurisdiction.

THEIR DUTIES SHALL CONSIST OF

1. To deploy the labour for detecting and repairing rat holes/cracks rain cuts and other defects.
2. To remove the Jungle from the inner toe of bank.
3. Puddle the river side of the banks as the flood raises.
4. To ensure that the gauges are being recorded directly and promptly by the Gauge Readers on duty.
5. To maintain the road for movement of the Vehicles.
6. To inform promptly to the Officer incharge regarding any apprehended danger and other important incidents.
7. Each Sub Engineer, will be responsible for receiving the emergency store required by him for the use of the labour and return the same to the Sub Engineer, Sheikh Chuahar section, the emergency is over.
8. They will ensure complete closure of culverts for water courses crossing flood bunds by Sluice valves or gunny bags.

OFFICIAL STAFF

The Sub Divisional Office will remain open for 24 Hrs: during flood days. The Head Clerk will depute the clerical staff to attend office Telephone No.047-9200300 promptly and for this purpose, the Executive Engineer will approve a duty roaster, before first July.

One cyclist will be deputed by Sub Divisional Officer Flood Bund to remain on duty in the Divisional Office for prompt delivery of the messages.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

DUTY ROSTER: BATTLE STATIONS OF KEY PERSONAL
DURING HIGH & EXCEPTIONALLY HIGH FLOOD FLOW

Name of Bund	Office Incharge	Field Staff on Flood Duty	Reach of Duty	Departmental Labour			
				Regular	Temporary Estt:	Sectional Estt:	
Thatta Mahla Flood Bund	Sub Divisional Officer flood Bund Sub Division & Sub Divisional Officers, Wer, Dhauhar Sub Division with two Magistrates.	Sub Engineer, SCR ----- Wer ----- MRW	RD. 0-6 RD: 6+000 -11+500	2 2	8 6	10+10 Wer & JRA 10+10 LKN & MRW	Sub Engineer, Thatta Mahla Flood Bund to Keep Vigilance in reach RD: 0+000 - 51+000 and arrange Labour & Material at Thatta Mahla Flood Bund.
		Zilladar BLN Sub Engineer Tawan ----- Jaura Zilladar SCR:	RD:11+500 -15+000 RD: 15-31 RD: 31-51	1 1 -	6 5 5 6	10 ASB: 10 TWN 10 KRW 30 70	
Jhang Flood Protection Bund	Sub Divisional Officer Flood bund Sub Division & Sub Divisional Officers, Wer, Veryam Sub Division & Deputy Collector with two Magistrates	Sub Engineer JWA Sub Engineer As-haba Sub Engineer VRM Zilladar----- Sub Engineer BLN: ----- Gojra Zilladar----- Sub Engineer AKW Zilladar Ashaba	RD: 0-18 RD: 18-31 RD: 31-42 RD: 42-71 (Tai)	1 2 3 1 7	4 10 6 10 31	10 Veryam 10 + 5 JWA BLN 10 GRA 10 AKW 45	Sub Engineer, Jhang Flood Protection Bund shall be In charge of store At RD: 23,000

Note:-

1. Sub Divisional Officer, Flood Bund Sub Division will be over all in-charge of all embankments.
2. During high Flood in case of emergency, Faisalabad Canal Division being the sister Division will be connected for performing Flood Duty alongwith its complete Establishment and Officers.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

CHAPTER-10

EMERGENCY TELEPHONE NOS.

Sr.No.	Departments	Office	Residence
1	Secretary I& Department Lahore	042-99212117-18	042-35731116
2	Deputy Commissioner Jhang	047-9200081	047-9200181
3	District Officer (Revenue)	047-9200107	047-9200299
4	Deputy District Officer (Revenue)	047-9200433	047-9200422
5	D.D.O.(R) Jhang.	047-9200433	047-9200422
7	D.P.O Jhang	047-9200444	047-9200445
8	Add: D.P.O Jhang	047-9200094	047-9200040
9	S. D.P.O Sadar	047-9200312	
10	Wireless Control	047-9200066	
11	Army Flood Officer 72 Medium GRW	2695064/5	
12	District & Session Judge	047-9200092	047-9200096
13	Executive Engineer Jhang Division L.C.C (W) Jhang	047-9200300	0334-6095161
14	Chief Engineer D & F Zone Lahore	042-99230731 Fax:5862081	0300-7315880
15	Telegraph Office Faisalabad	041-9200774	
16	Flood Warning Centre Lahore	042-7572091-93	Fax: 042-7572092
17	Flood Emergency Office Faisalabad	041-9200270	

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

Sr.No.	Departments	Office	Residence
18	Chief Engineer Irrigation Faisalabad	041-9200268	041-9200269
19	Executive Engineer Khanki Division	055-6266239 055-6605255	055-766239
20	Executive Engineer Trimmu	047-7647200	0301-3277500
21	Executive Engineer Q.B Link Division Farooqabad	0563-874046	0563-876430
22	Superintending Engineer Q.B Link Circle Farooqabad	04945-874046	04945-874046
23	Superintending Engineer, Lower Chenab Canal West Circle Faisalabad	041-9200272	041-9200272
24	Director Flood / Secretary, Flood Commission Punjab, Lahore	042-99231614	0300-4777120
25	Executive Engineer Qadirabad Barrage Division	0547-550190	0547-550190
26	Tele Office Qadirabad Barrage Division	0547-550490	0547-550490
27	Sub Divisional Officer, Flood Sub Division LCC(W) Jhang	047-9200305	0316-7839321

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

CHAPTER-11

Standard operating procedure (SOP) for Breaching Sections

There is no breaching section under control of Jhang Canal Division Jhang.

Hence action mentioned from serial No. 11.1 to 11.12 is not applicable.

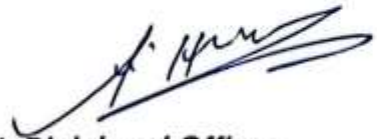
11.1	History of the breaching section	There is no breaching section under control of this office.
11.2	Location, Design, Quantity and Variety of the explosive required for detonation.	There is no breaching section under control of this Division so there is no Location, Design, Quantity and Variety of the explosive required for detonation.
11.3	Arrangement of explosives and security of explosive stores	There is no breaching section under control of this office so there is no Arrangement of explosives and security of explosive stores.
11.4	List of the security staff alongwith detail of their training etc	There is no Security staff sanctioned for this office.
11.5	Detail of mechanical means as a standby arrangements in case of detonation failure	There is no breaching section under control of this office.
11.6	Duty Roster in case of critical situation	Duty Roster in case of critical situation mentioned at Page #41-43)
11.7	Breaching Committee with their action plan	There is no breaching section at any site of this office so no Breaching Committee with their action plan
11.8	List of the villages likely to be inundated in case of breach	List the villages likely to be inundated in case of breach at Page No.37.
11.9	Announcement and detail of evacuation arrangements	The matter related to Administration Department
11.10	Details of coordination with Civil/Army Authorities	According to the critical situation the coordination with the Civil / Army Authorities well in time. Flow


Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang


Executive Engineer
Jhang Division LCC(W)
Jhang

11.11	Parallel communication arrangements	According to the critical situation the coordination with the Civil / Army Authorities well in time.
11.12	Index Plan	There is no breaching section under control of this office so there is no need of index plan



Sub Divisional Officer,
 Flood Sub Division LCC(W),
 Jhang


Executive Engineer,
 Jhang Division LCC(W)
 Jhang.


Superintending Engineer, 04/03/25
 Lower Chenab Canal(W) Circle,
 Faisalabad.


Chief Engineer,
 Faisalabad Irrigation Zone,
 Faisalabad.


Sub Engineer


Sub Divisional Officer
 Flood Bund Sub Division
 Jhang


Executive Engineer
 Jhang Division LCC(W)
 Jhang

FLOOD FIGHTING PLAN- 2025.

PART – B

Chapter-12

VULNERABLE SITES ON FLOOD BUND/STRUCTURES: THATTA MAHALLA FLOOD BUND & JHANG FLOOD PROTECTION BUND

12.1 APPREHENDED BREACH SITES IN FLOOD BUNDS/STRUCTURES

There is no apprehension site of flood bunds in Jhang Division

12.2 OPERATION OF BREACHING SECTION

There is no breaching section in jurisdiction of Jhang Canal Division Jhang. The breaching section exists at Revaz Bridge and relates to Railway Department.

12.3 BREACHES DUE TO RISING OF FLOOD WATER , DETERIORATION OF FLOOD BUNDS ETC

- Nil-

Sr.No.	Name of Structure	Location of Vulnerable Site	Reference of contingency Plan
No vulnerable reach			

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

CHAPTER-13

EMERGENCY CONTINGENCY PLAN FOR VULNERABLE SITES LISTED ABOVE. EMERGENCY CONTINGENCY PLAN MUST INCLUDE-

THATTA MAHALLA FLOOD BUND

13.1 PLAN SHOWING ROUTE OF FLOOD WATER COMING OUT OF THE BREACH SUPPORTED WITH LEVELS.

After Completion of work by PIU, Remodeling Selected reaches of Thatta Mahla Flood Bund there is no vulnerable sites on Thatta Mahla Flood Bund.

13.2 Detail of villages abadies likely to be affected and this should be shown on the plan.

LIST OF THE VILLAGES LIKELY TO BE INUNDATED DURING VARIOUS FLOOD LIMITS

LOW FLOOD

Ballo Shahabal, Sultanpur, Koriana, Ramana.

MEDIUM FLOOD

Mauza Shamal, Mauza Maghiana, Mauza Lindi Bag, Chak Shakhiana, Thatta Mahla.

HIGH FLOOD

Mauza Khewa, Mauza Khanuana, Mauza Pacca Wala, Mouza Kharora Baqar, Mauza Viglana , Thatti Rehmana, Mauza Ballian, Mauza Kurhian Wala, Mauza Patuana, Mauza Hasnana,

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

LIST OF VILLAGES LIKELY TO BE MAROONED IN CASE OF BREACHING SECTION

Under mentioned Villages are likely to be marooned when the breaching section is operated.

Kot Khira , Vijhlana, Mouza Paccay wala

JHANG FLOOD PROTECTION BUND

13.1 PLAN SHOWING ROUTE OF FLOOD WATER COMING OUT OF THE BREACH SUPPORTED WITH LEVELS.

After Completion of work by PIU, Remodeling Selected reaches of Jhang Flood Protection Bund there is no vulnerable sites on Jhang Flood Protection Bund.

13.2 Detail of villages abadies likely to be affected and this should also be shown on the plan.

LIST OF THE VILLAGES LIKELY TO BE INUNDATED DURING VARIOUS FLOOD LIMITS

LOW FLOOD

Mouza Choori Noona, Mouza Maghiana , Mouza Baila Bungash

MEDIUM FLOOD

Mouza Diraj , Mouza Hasnana

HIGH FLOOD

Mouza Hasnana, Mouza Vijhlana, Mouza Kot Khaira, Mouza Malluana,

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

LIST OF VILLAGES LIKELY TO BE MAROONED IN CASE OF BREACHING

Under mentioned Villages are likely to be marooned when the breaching section is operated.

Billi Kaleke, Asamo, Jandran ,Habib ,Pacca Wala

13.3 Strategy and action taken be explained in detail. This may include.

13.3.1 Arrangements

13.3.2 Establishment of Flood Fighting Camps.

Sr. No.	Description of Flood Fighting Camps	Location of Camps	Remarks
1	Jhang Flood Protection Bund	At RD:6+000.	There is no Flood Fighting material available which will be purchase before flood season 2025 and duty staff officers/ officials will be engaged.
2	Jhang Flood Protection Bund	At RD:23+000.	There is no Flood Fighting material available which will be purchase before flood season 2025 and duty staff officers/ officials will be engaged.
4	Thatta Mahalla Flood Bund	At RD:1+500	There is no Flood Fighting material available which will be purchase before flood season 2025 and duty staff officers/ officials will be engaged.
5	Thatta Mahalla Flood Bund	At RD:11+500	There is no Flood Fighting material available which will be purchase before flood season 2025 and duty staff officers/ officials will be engaged.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

13.3.3 Duties of Officers/Officials and their camp sites
During High Flood Flow (as per page #43-44.)

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

Name of Bund	Office Incharge	Field Staff on Flood Duty	Reach of Duty	Departmental Labour			
				Regular	Temporary Estt:	Sectional Estt:	
Thatta Mahla Flood Bund	Sub Divisional Officer flood Bund Sub Division & Sub Divisional Officers, Wer, Dhaur Sub Division with two Magistrates.	Sub Engineer, SCR ----- Wer ----- MRW	RD. 0-6 RD: 6+000 -11+500	2 2	8 6	10+10 Wer & JRA 10+10 LKN & MRW	Sub Engineer, Thatta Mahla to Keep Vigilance in reach RD: 0+000 - 11+500 and arrange Labour & Material at Thatta Mahla Flood Bund.
		Zilladar BLN Sub Engineer Tawan ----- Jaura Zilladar SCR:	RD:11+500 -15+000 RD: 15-31 RD: 31-51	1 1 -	6 5 5 6	10 ASB: 10 TWN 10 KRW 30 70	
		Sub Engineer JWA Sub Engineer As-haba Sub Engineer VRM Zilladar----- Sub Engineer BLN: ----- Gojra Zilladar----- Sub Engineer AKW Zilladar Ashaba	RD: 0-18 RD: 18-31 RD: 31-42 RD: 42-71 (Tai)	1 2 3 1 7	4 10 6 10 31	10 Veryam 10 + 5 JWA BLN 10 GRA 10 AKW 45	
Jhang Flood Protection Bund	Sub Divisional Officer Flood bund Sub Division & Sub Divisional Officers, Wer, Veryam Sub Division & Deputy Collector with two Magistrates						Sub Engineer Jhang Flood Bund shall be In-charge of store At RD: 23,000

Sub Divisional Officer, Flood Bund Sub Division will be in charge of overall embankments

13.3.4 Departmental Machinery available

There is no departmental machinery in control of Jhang Canal Division Jhang. However in case of any emergency during flood season 2022, the Government Machinery / Bulldozers of Agricultural Engineering Department Punjab will be arranged.

13.3.5 Machinery available from Private Source

If the exceptionally high flood is forecasted by the Meteorological Department, the following machinery will be arranged / hired from private source.

1 No. Bulldozer, 2 No. Excavator Machines, 6 No. Tractors with trollies and 1 No. tractor with blade will be arranged for Thatta Mahla Flood Bund and same equipment / machinery for Jhang Flood Protection Bund.

Sub Engineer

Sub Divisional Officer
Flood Bund Sub Division
Jhang

Executive Engineer
Jhang Division LCC(W)
Jhang

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Executive Engineer
Jhang Division LCC(W)
Jhang

13.3.3 Duties of Officers / Official and their Camp Sites

Sr. #	Location	Officer (Name + Designation + Mob.No.)	Official (Name+ Designation + Mob.No.)
3	Jhang Flood Protection Bund	Mr. Ali Hussain ,SDO Flood Bund , (0316-7839321) & Danish Majeed SEN, (0341-0518828)	Muhammad Ilyas Beldar(03424041142) Gojra Section
	0+000 to 1+000		Imran Khan S/O Sarwar Khan Beldar SCR sec.
	1+000 to 2+000		Muhammad Ijaz S/O Shahmand Beldar SCR Sec
	2+000 to 3+000		Muhammad Ramzan Beldar(03086942574) SCR Sec
	3+000 to 4+000		Anwar Masih Male
	4+000 to 5+000		Muhammad Akbar Beldar(03416938486) Gojra Section
	5+000 to 6+000		Imran Masih Beldar(03059174847) Veryam Section
	6+000 to 7+000		Ashfaq Ahmad Beldar(03427899705) Veryam Section
	7+000 to 8+000		Amir Jabbar S/O Abdul Jabbar beldar TWN sec.
	8+000 to 9+000		
	9+000 to 10+000		
	10+000 to 11+000		Talib Hussain Chowkidar (03427810857) Lakhana Section
	11+000 to 12+000		Talib Hussain Chowkidar (03427810857)
	12+000 to 13+000		Kaswar Abbas S/O Munawar Hussain Beldar SCR Sec
	13+000 to 14+000		Arshad Ali S/O Muhammad Rasheed Male TWN sec
	14+000 to 15+000		Rub Nawaz Beldar(03464850278) Janiwal Section
	15+000 to 16+000		Muhammad Akram Male (
	16+000 to 17+000		Amjad Ali Dak Runner(03411560297) Gojra Section
	17+000 to 18+000		Zawar Hussain S/O Sultan Beldar SCR section
	18+000 to 19+000		Iqbal Masih (Lakhana sec)
	19+000 to 20+000		Ataf Hussain Cwk (Lakhana sec)(03476599953)
	20+000 to 21+000		Munawar Beldar (Muradwala sec)(03447814225)
	21+000 to 22+000		Muhammad Afzal Chowkidar (Twn sec)(0342-7685183)
	22+000 to 23+000		Naveed Alam Mistry(03435987391) Akalwala Section
	23+000 to 24+000		Muhammad Ayub Beldar Akalwala Section
	24+000 to 25+000		Sultan Khan Beldar(0457972409) Akalwala Section
	25+000 to 26+000		Abdul Razzaq Male Janiwal Section
	26+000 to 27+000		Mushtaq Ahmad Chowkidar Janiwal Section
	27+000 to 28+000		Zafar Iqbal Beldar (03427895229) Ashabha Section
	28+000 to 29+000		Muhammad Nawaz Sharif Beldar (03413440841) Ashabha Section
	29+000 to 30+000		Tanvir Haider Beldar(03447957038) Ashabha Section
	30+000 to 31+000		Muhammad Iqbal Male (03417952647) Veryam Section
	31+000 to 32+000		Lai Mistry(03467252478) Akalwala Section
	32+000 to 33+000		Shoukat Ali Beldar(03406943314) Akalwala Section
	33+000 to 34+000		Sikandar Hayat Male (03006518987) Veryam Section
	34+000 to 35+000		Iqbal Beldar Veryam Section
	35+000 to 36+000		Noor Ahmad Sweeper Veryam Section
	36+000 to 37+000		
	37+000 to 38+000		Sarfraz Beldar(03477934017) Veryam Section
	38+000 to 39+000		Muhammad Umar Shahzad S/O Muhammad Nasim Beldar Gojra sec
	39+000 to 40+000		Falak Sher Beldar Veryam Section
	40+000 to 41+000		Haq Nawaz Beldar
	41+000 to 42+000		Muhammad Asad S/O Dilshad Ahmad Beldar LKN sec
	42+000 to 43+000		Anwar Ali S/O Mukhtar Ahmad Beldar JRA sec
	43+000 to 44+000		Lai Khan Beldar(03418661506) JRA Section
	44+000 to 45+000		Adeeb Sultan Beldar Khairwala Section
	45+000 to 46+000		Umar Hayat R/Beldar(0427655862) JRA Section
	46+000 to 47+000		Irfan Zafar Beldar(03424584155) BLN Sec
	47+000 to 48+000		Muhammad Ramzan Beldar(03478871706) BLN Sec
	48+000 to 49+000		Muhammad Iqbal Beldar(03427942931) BLN Sec
	49+000 to 50+000		Saif Ullah Chowkidar BLN Sec
	50+000 to 51+000		Muhammad Riaz Beldar (03418672284)
	51+000 to 52+000		Allah Yar Beldar(Lkn sec)(03437935593) LKN Sec
	52+000 to 53+000		Abdul Sattar Beldar Khairwala Sec
	53+000 to 54+000		Dilshad Ahmad Beldar(03447851730) LKN Sec
	54+000 to 55+000		Noor Muhammad Beldar LKN Sec
	55+000 to 56+000		Muhammad Hussain Male LKN Sec
	56+000 to 57+000		Ijaz Ahmad Beldar(03427972956) LKN Sec
	57+000 to 58+000		Yaqub Ali S/O Muhammad Ismail Beldar Lkn sec.
	58+000 to 59+000		Amir Sohail Beldar(03441738615) Khairwala Sec
	59+000 to 60+000		Muhammad Umair Naseer Beldar Khairwala section
	60+000 to 61+000		Muhammad Baqir Male (03478824941) SCR Sec
	61+000 to 62+000		Muhammad Imran S/O Ramzan Beldar SCR sec
	62+000 to 63+000		Muhammad Riaz Beldar
	63+000 to 64+000		Muhammad Asif Beldar(03469311202) Muradwala Sec
	64+000 to 65+000		Muhammad Shahbaz Khan S/O Shahmand Beldar SCR sec
	65+000 to 66+000		Tanvir Masih S/O Aslam Masih Beldar JNW sec
	66+000 to 67+000		Ghulam Jaffar S/O Said Beldar Khairwala sec
	67+000 to 68+000		Muhammad Imran S/O Riaz Beldar LKN sec
	68+000 to 69+000		Yasir Aslam S/O Muhammad Aslam Beldar SCR sec
	69+000 to 70+000		Muhammad Bilal S/O Muhammad Iqbal beldar VRM sec.
	70+000 to 71+000		Naeem Abbas S/O Muhammad Hanif Beldar TWN sec.

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13.3.6 FLOOD FIGHTING MATERIAL REQUIRED
13.3.7 FLOOD FIGHTING MATERIAL AVAILABLE

Sr. No.	Name of Item	Unit	Total Required Quantity	Available Quantity	Required Quantity	Remarks
1	Axes	No.	80	-	80	Required flood fighting material will be purchased before 30.06.2025
2	Bamboos 8' to 10' (for Lighting arrangements)	No.	904	-	904	
3	Chouldaries	No.	5	-	5	
4	E.G. Bags	No.	4500	-	4500	
5	Folding Chair	No.	24	-	24	
6	Folding Table	No.	4	-	4	
7	G.I. Buckets	No.	100	-	100	
8	Generator (8.00 K.Watts)	No.	2	-	2	
9	Hand Saws	No.	4	-	4	
10	Handle for Kassi / Axes	No.	200	-	200	
11	Kassi with Handles	No.	625	-	625	
12	M. Oil	Litter	20	-	20	
13	Manila Rope	Kg	50	-	50	
14	Petrol for Generator	Litter	200	-	200	
15	Steel Charpoy	No.	20	-	20	
16	Torches Chargeable	No.	52	-	52	
17	Umbrella	No.	20	-	20	
18	Cotton bags	No.	47	-	47	
19	Jackets	No.	25	-	25	
20	Polyethene Sheet	Kg	5000	-	5000	

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13.4. Detail of other infrastructure like electric, Sui Gas, Telephone installations, road network, other buildings, canals and drainage network.

List of Infrastructure coming under water is as under:-

- | | | | |
|-----|------------------------------------|---|---------|
| 1. | Government Hospital | = | 2 Nos. |
| 2. | Private Hospital | = | 16 Nos. |
| 3. | Schools | = | 16 No. |
| 4. | D.C Office | = | 1 NO. |
| 5. | High Ways Offices | = | 1 No. |
| 6. | Irrigation Offices | = | 1 No. |
| 7. | Rail Way Lines | = | 1 No, |
| 8. | Main Pacca Roads | = | 3 Nos. |
| 9. | Courts | = | 1 No. |
| 10. | P.T.C.L Offices | = | 1 No. |
| 11. | W.A.P.D.A Offices | = | 1 No. |
| 12. | SUI GASS Offices | = | 1 No. |
| 13. | Private Property Like Kacha Houses | | |



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Jhang Division L.C.C(W)
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Superintending Engineer, 04/03/25
Lower Chenab Canal West Circle
Faisalabad.



Chief Engineer
Faisalabad Irrigation Zone,
Faisalabad.



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CHAPTER-14

ACTION PLAN

14.1 RE-SHUFFLING/ RECOUPING PLAN OF RESERVE STONE DEPARTMENTALLY.

Through Tractor Trolley.

14.2 DETAIL OF INLET/ OUTLET CROSSING ALONG WITH CLOSING METHODOLOGY

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14.3 DEPLOYMENT OF MACHINERY (MEDIUM TO HIGH STAGE)

Sr.No	Name of Structure	Length in Mile	Vulnerable Reach	Camp. Location	Site Incharge by name & Cell No.	Machinery Deployed					Availability of Stone Cft
						Excavator	Dozer	Trolleys / Dumpers	Tractor with front blade	Labour Beldar +Mate	
1	2	3	4	5	6	7	8	9	10	11	12
1	Jhang Flood Protection Bund	14.20	0-10	RD 6+000	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Danish Majeed SEN, (0341-0518828)	1	1	2	2	10	-
			20-31	RD 23+000	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Danish Majeed SEN, (0341-0518828)	1	-	2	2	12	-
			47-55	RD 52+000	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Danish Majeed SEN, (0341-0518828)	1	-	2	2	11	-
2	Thatta Mahalia Flood Bund	10.20	0-6	RD 1+500	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	-	2	3	12	-
			7-13	RD 11+500	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	1	2	3	18	-
			15-20	RD 18+000	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	-	2	2	7	-
3	Loop Flood Bund	2.30	-	RD 0+000 RD 11+000	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	-	2	2	-	-
					Total	7	2	14	16	70	

Note:-Payment for Machinery and work charge employees subject to verification of TPM/ Consultants.


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14.4 DEPLOYMENT OF MACHINERY (HIGH TO VERY HIGH)

Sr.No	Name of Structure	Length in Mile	Vulnerable Reach	Camp. Location	Site Incharge by name & Cell No.	Machinery Deployed					Availability of Stone Cft	
						Excavator	Dozer	Trolleys / Dumpers	Tractor with front blade	Labour Beldar +Mate		
1	2	3	4	5	6	7	8	9	10	11	12	
1	Jhang Flood Protection Bund	14.20	0-10	RD 6+000	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Danish Majeed SEN, (0341-0518828)	1	1	2	2	12	-	
			20-31	RD 23+000	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Danish Majeed SEN, (0341-0518828)	1	-	2	2	14	-	
			47-55	RD 52+000	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Danish Majeed SEN, (0341-0518828)	1	-	2	2	12	-	
2	Thatta Mahalla Flood Bund	10.20	0-6	RD 1+500	Mr.Ali Hussnain ,SDO Flood Bund , (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	-	2	3	14	-	
			7-13	RD 11+500	Mr.Ali Hussnain ,SDO Flood Bund , (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	1	2	3	20	-	
			15-20	RD 18+000	Mr.Ali Hussnain ,SDO Flood Bund , (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	-	2	2	8	-	
3	Loop Flood Bund	2.30	-	RD 0+000 RD 11+000	Mr.Ali Hussnain ,SDO Flood Bund , (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	-	2	2	0	-	
Total						7	2	14	16	80		

Note:-Payment for Machinery and work charge employees subject to verification of TPM/ Consultants.


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14.5 DEPLOYMENT OF MACHINERY (VERY HIGH TO EXCEPTIONALLY HIGH)

Sr.No	Name of Structure	Length in Mile	Vulnerable Reach	Camp. Location	Site Incharge by name & Cell No.	Machinery Deployed					Availability of Stone Ckt
						Excavator	Dozer	Trolleys / Dumpers	Tractor with front blade	Labour Beldar +Mate	
1	2	3	4	5	6	7	8	9	10	11	12
			0-10	RD 6+000	Mr.Ali Hussnain ,SDO Flood Bund , (0316-7839321) & Danish Majeed SEN, (0341-0518828)	1	1	2	3	14	-
1	Jhang Flood Protection Bund	14.20	20-31	RD 23+000	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Danish Majeed SEN, (0341-0518828)	1	-	2	3	16	-
			47-55	RD 52+000	Mr.Ali Hussnain ,SDO Flood Bund, (0316-7839321) & Danish Majeed SEN, (0341-0518828)	1	-	2	3	14	-
			0-6	RD 1+500	Mr.Ali Hussnain ,SDO Flood Bund , (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	-	2	3	16	-
2	Thatta Mahalla Flood Bund	10.20	7-13	RD 11+500	Mr.Ali Hussnain ,SDO Flood Bund , (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	1	2	3	24	-
			15-20	RD 18+000	Mr.Ali Hussnain ,SDO Flood Bund , (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	-	2	3	10	-
3	Loop Flood Bund	2.30	-	RD 0+000 RD 11+000	Mr.Ali Hussnain ,SDO Flood Bund , (0316-7839321) & Zain Murtaza SEN, (0312-7803870)	1	-	2	3	-	-
					Total	7	2	14	21	94	

Note:-Payment for Machinery and work charge employees subject to verification of TPM/ Consultants.


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14.6 POLICE DEPLOYMENT PLAN

Performa-1

Sr. No.	Site of Breaching Section	Concerned Canal Division	Concerned Police Station and District	Police Persons Deployed		Remarks (if any)
				Inspector /Sub Inspector / A.S.I	Constable	
Relates to Civil Administration Department						

Performa-2

Sr. No.	Vulnerable Sites used for illegal cuts during floods	Concerned Canal Division	Concerned Police Station and District	Police Persons Deployed		Remarks (if any)
				Inspector /Sub Inspector / A.S.I	Constable	
Relates to Civil Administration Department						

Performa-3

Sr. No.	Name of Barrage	Concerned Canal Division	Concerned Police Station and District	Police Persons Deployed		Remarks (if any)
				Inspector /Sub Inspector / A.S.I	Constable	
Relates to Civil Administration Department						

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14.7 DETAILS OF SYNTHETIC BAGS WITH CAPACITY OF 500 KG AND 1000KG

There is no requirement of synthetic bags for vulnerable reaches after strengthening of flood bunds under work Remodeling of Selected reached by PIU.

14.8 DETAILS OF POLYTHENE SHEET OF BLACK COLOUR TO PROTECT UPSTREAM SLOPE AGAINST WAVE ACTION AND TO CONTROL SEEPAGE THROUGH EMBANKMENTS

Sr. No.	Name of Flood Bund	Unit	Total Required Quantity	Available Quantity	Required Quantity
1	Thatta Mahla Flood bund	Kg..	2000	150	1850
2.	Jhang Flood Protection Bund	Kg.	3000	350	2650
	Total	Kg	5000	500	4500

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CHAPTER-15

BACK UP DIVISIONS (IN CASE OF BREACH)

N.A

Faisalabad Drainage Division , Faisalabad.

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Flood Protection Bunds.

