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NATIONAL MONSOON CONTINGENCY RESPONSE DIRECTIVE 2016

(To be read in conjunction with National Disaster Response Plan 2010)

General

- 1. NDMA is mandated under Clause 9(a) of NDM Act 2010 "To act as implementing, coordinating and monitoring body for disaster management". It is also required under Clause 9(d) of the Act "To laydown guidelines for preparing disaster management plans by different ministries or departments and Provincial Authorities". Furthermore, under Clause 9(f) of NDM Act 2010, NDMA is to "Coordinate Response in the event of any threatening disaster situation or disaster". Monsoon in Pakistan results into rainfall of variable intensity from July to September each year. The risk of flood hazards associated with Monsoon can turn into a disaster which merits prior preparation by all departments at Federal and Provincial level. NDMA being the lead Federal Agency, as per assigned mandate issues a Monsoon Contingency Response Directive, every year before Monsoon, based on the forecast of Pakistan Meteorological Department to lay down response guidelines in the realm of Flood Disaster Management i.e. flood fighting, preparedness, rescue, relief, recovery, rehabilitation etc to reassert the coordination mechanism amongst all stakeholders.
- 2. <u>Aim</u>. To lay down Response Guidelines for all stakeholders at Federal and Provincial level including AJ&K for a coherent response against visualised contingencies of Monsoon 2016, based on Forecast of Pakistan Meteorological Department in order to ensure sound disaster management against possible floods.

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3. **Scope**

- a. Part I General Aspects
 - (1) Responsibility Matrix.
 - (2) Limitations in Existing Response Mechanism.
 - (3) Shortfalls observed from Past Experiences.
- b. Part II Flood Threat and Vulnerabilities
 - (1) Pre-Monsoon Forecast –2016 by Pakistan Meteorological Department.
 - (2) NDMA's Conclusions from Pre-Monsoon Forecast 2016.
 - (3) NDMA's Visualised Contingencies of Monsoon 2016.
 - (4) Provincial Flood Hazard Maps and District Wise Vulnerability Matrix.
- c. Part III Response Guidelines.
- 4. Responsibility Matrix. An overview of responsibility matrix at National and Provincial level is as under:
 - a. Weather and Flood Forecast
 - (1) Weather Forecast Pakistan Meteorological Department (PMD).
 - (2) Flood Forecast Flood Forecasting Division (FFD) of PMD.
 - b. <u>Flood Management and Fighting</u>. Flood management means regulation of flood through dams, hydraulic structures, flood canals and flood protection works including flood fighting against accidental breaches. The responsibilities are:-
 - (1) Riverine Flood / Flash Flood / GLOF
 - (a) National Coordination Agency Federal Flood Commission (FFC).
 - (b) Provincial Coordination Agency Provincial Irrigation Departments (PIDs).
 - (2) <u>Urban Flood</u>. By respective Municipal Corporations / City Development Authorities / Local Governments.
 - (3) <u>Management of Terbela and Mangla Dams</u>. Water and Power Development Authority (WAPDA).
 - c. <u>Flood Disaster Management (Rescue, Relief, Recovery, Reconstruction and Rehabilitation)</u>. This activity starts before floods and extended during onset of floods as well as after the floods:-
 - (1) National level coordination by NDMA.
 - (2) Provincial / Regional level coordination by PDMAs / SDMA / GBDMA / FDMA / ICT DM Cell.
 - (3) District level coordination by DDMAs under respective District Governments / DCOs / Political Agents (FATA) / CDA (ICT).
 - (4) Emergency response in support of National / Provincial effort by Pakistan Armed Forces / Civil Defense / Rescue 1122 and other humanitarian response agencies.
 - d. Coordination of flood discharge data from India by Pakistan Commission for Indus Water (PCIW).
 - e. Maintenance / restoration of National highways by National Highway Authority (NHA).
 - f. Maintenance / restoration of railways communication infrastructure by **Pakistan Railway**.
 - g. Maintenance / restoration of telecommunication infrastructure and transmission of SMS alerts for communities by **Pakistan Telecommunication Authority (PTA)**.



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- h. Maintenance / restoration of provincial highways by respective **C&W Departments of Provinces and AJ&K.**
- Pre-Flood Assesment, Post-Flood Damage Assesment using satellite technology by SUPARCO.
- 5. <u>Limitations in Existing Response Mechanism</u>. Some limitations exist in the response mechanism against flood hazards. These limitations must be kept in view while planning and preparing flood response plans by all stakeholders:-

a. Meteorological and Flood Forecasting System

- (1) Prediction capability of medium to long range forecasting is only for **7 to 15 days**.
- (2) Seasonal Weather Prediction can be expected with **65-70% accuracy level**.
- (3) Availability of discharge data of water in the **eastern rivers** is dependent upon accurate and timely passage of information by India.
- (4) There is no telemetry / early warning system for **flash floods in hill torrents** of South Punjab, Khyber Pakhtunkhwa, Balochistan, AJ&K, GB and FATA which impacts on early warning time for communities.
- (5) Deficiency as well as **old vintage of meteorological and hydrological sensors** has a bearing on qualitative, quantitative and precision of weather forecast, especially against erratic weather pattern viz-a-viz climate change phenomenon.
- b. <u>Adhoc Functioning of District Disaster Management Authorities</u>. Adhoc functioning of District Disaster Management Authorities owing to non-availability of dedicated human resource, assignment of dual responsibility to District Administration and weak functioning of local Government System has a profound bearing on local response capability at the lowest tier.
- c. <u>Availability of Aviation Assets</u>. Aviation assets of Armed Forces and Ministry of Interior are employed for rescue and relief efforts. Their requisitioning and employment entails time. Furthermore, the helicopters of Pak Navy and Pakistan Air Force are normally not employed in Northern Areas.
- d. <u>Encroachments in River Plains</u>. Permanent settlements and encroachments in the river / flood plains is a constant challenge for rescue and relief efforts.
- e. **Non-Availability of Hazard Atlas**. Non-availability of hazard atlas affects precise planning for disaster management and often results in undue dilution of resources.
- f. **Town Planning**. Inadequate town planning in major cities, unplanned expansions and inefficient sewerage water disposal system during rains cause urban flooding.
- g. Resistance to Evacuation and Move to Relief Camps. Local residents generally resist evacuations till last moment and demand relief at site instead of planned relief camps which increases quantum of rescue and relief effort.

6. **Shortfalls Observed from Past Experiences**

- a. Limited / non-availability of **storage facilities of relief goods** (shelters etc) at district level, delayed procurements and tendency of emergency procurement resulting into delayed response as well as compromise on transparency in procurement. Alongside that a premature pull is exercised on NDMA stocks.
- b. Heavy demands of tents distribution at waterline / site, every year to same community instead of moving people to relief camps results in large scale distribution of relief goods especially tents which can otherwise be economised.
- c. Unregulated / uncoordinated relief effort by civil society leads to saturated relief in some areas while



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neglecting same in critical areas.

- d. **Rescue boats of low Horse Power** are sometimes difficult to operate in fast current of flood waters.
- e. Damage assessment process and **damage reporting** is sometimes inflated.
- f. Management of data base for issuance of relief assistance (Non Food Items) remains wanting.
- g. Disaster management sometimes overlooks the special requirements of **vulnerable groups** (aged, disabled, women and children) which affects the need based rescue and relief activities.
- h. **Non availability of electricity backup system** / generators for clean water supply as well as sewerage disposal system in urban areas accentuate urban flooding and denies clean drinking water supply.
- i. Integration of **Civil Defense**, **Boy Scouts**, **Girl Guides and NGOs** in relief operations remains a persistent weak link.
- j. Some **flood protection works** remain incomplete due to late release of funds.
- k. Payment mechanism for compensation is slow.



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Flood Threat and Vulnerabilities

- 7. <u>Pre-Monsoon Outlook 2016 by PMD</u>. The El-Nino Phenomenon has weakened and La-Nina is favoured to develop during the Summer 2016. Prevailing oceanic and atmospheric conditions are giving indication of good Summer Monsoon rainfall in the Country. Based on statistical and dynamical downscaling of global circulation models, outlook for the season is prepared at 80% confidence level for planning purposes. The outlook for the season (July September) 2016 is as under:
 - a. Summer monsoon rainfall is likely to be **10-20% above normal over the Country**, averaged for three months.
 - b. More than average rainfall is expected over Punjab, KP, Sindh, AJ&K and North East Balochistan.
 - c. **Some extreme rainfall events** are likely to occur in the catchment areas of major rivers which may cause floods.
 - d. There is also a **high probability of heavy downpour** which may generate **Flash Flooding along Suleman Range**.
 - e. Some heavy downpour events may produce **urban flooding in big cities**.
 - f. Some strong incursions of Monsoon currents, coupled with high temperature, may trigger **Glacial Lake**Outburst Floods (GLOF), Landslides and Flash Floods in Upper KP and GB.
- 8. <u>NDMA's Conclusions from PMD's Pre-Monsoon Forecast 2016</u>. Keeping in view, the Pre-Monsoon Forecast of 2016 issued by PMD, various conclusions can be drawn as under:
 - a. The Forecast is broad based, predicting riverine floods, flash floods and urban floods in various parts of the Country including AJ&K which calls for a "Comprehensive Response" against all eventualities.
 - b. Interpretation of "Above Normal Rainfall Averaged for three Months" means "Above Normal Rains in some areas" & "Normal / Below Normal Rains in other areas" resulting into cumulative degree of "Above Normal Rainfall" all over the Country over the period of Monsoon (July September). Hence, the need to visualize realistic contingencies in Monsoon prone areas for entire period of Monsoon 2016.
 - c. **Synchronous effect** of riverine floods, flash flood and urban flood in areas vulnerable to all three flood hazards cannot be ruled out. Hence, the need to configure correct response in such regions / areas becomes imperative.
 - Possibility of combined effect of GLOF, landslides and flash floods calls for enhanced vigilance for community early warning, identification of likely GLOF sites and placement of response measures in district Chitral and GB from the outset.
 - e. Possibility of extreme weather events in catchment areas of eastern and western rivers viz-a-viz identified limitations of own hydro-meteorological forecasting capability **may limit early warning time**, hence, need to have **sound safeguards** for flood fighting as well as careful management of storage dams.
 - f. Punjab, KP, Sindh, North East Balochistan and AJ&K figure out to be recipient of possibly above average rainfall, which may be simultaneous or sequential in nature, either in part or whole of the province / region including possibility of high intensity rain for a long / short period which dictates decentralized configuration of resources by all stakeholders to cater for simultaneous as well as local response at any part of respective provinces / regions.
- 9. <u>NDMA's Visualised Monsoon Contingencies</u>. The Monsoon rains coupled with increased hydrological discharge resulting out of glacier melting enhance the possibility of riverine floods. Alongside that flash flood in hill torrents and urban flooding in city centers remain a **Common Possibility**. The visualised contingency scenarios are as under:-



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a. Scenario - 1 (Most Likely) - Moderately Above Normal Monsoon

- (1) Moderately Above Normal Monsoon (10-20% More than Average) will **prevail all over Pakistan** and AJ&K.
- (2) The intensity may be "High" in Punjab, KP, Sindh, North East Balochistan and Normal / Below Normal, elsewhere.
- (3) The duration of Monsoon may remain limited to July September 2016 in which Monsoon may be evenly spread or intense in one period while less intense in remaining period.
- (4) **High flood events** may be caused in certain rivers for a "slightly prolonged period".
- (5) Urban flooding, landslides, avalanches, flash floods, GLOF may have **high degree of occurrence** in cities / regions prone to such hazards, in a **"repetitive manner"**.

b. Scenario 2 (Probable) - Intense Monsoon. Similar to Scenario 1 with following changes:-

- (1) Intense Monsoon will prevail all over Pakistan & AJ&K.
- (2) **Extreme events** may happen in intervals or in a sequential manner, impacting on peak intensity at one time or in a sequential manner i.e. one after the other.
- (3) **Peak high floods** may happen in most of the rivers.
- (4) Urban flooding, landslides, avalanches, flash floods, GLOF likely to occur **repetitively to high degree** in cities / regions prone to such hazards.
- (5) **Increased cyclonic activity** in Arabian Sea may compliment Monsoon.
- (6) Extreme events of "high intensity rains for a long period" or "high intensity rains of short period" may occur in Monsoon prone regions causing **variable effects**.
- c. <u>Scenario 3 (Less Probable) Erratic Monsoon</u>. Similar to Scenario 2 with following changes:-
 - (1) **Major pressure of Monsoon shifts** to catchment areas of the eastern / western rivers, North Punjab, KP, AJ&K and GB giving rise to increased riverine floods.
 - (2) **Secondary pressure** remains on flash flood prone areas of South Punjab and North East Balochistan with rains in contiguous areas.
 - (3) Duration may even **prolong beyond September**.
 - (4) **Peak flood conditions** exist particularly in western rivers affecting areas of Punjab and Sindh.

d. Scenario 4 (Most Dangerous) - Abnormal Monsoon

- (1) Combination of Scenario 2 & 3 like Super Floods of 2010.
- (2) Extra ordinary flood conditions triggered by some extreme events.
- 10. **Provincial Flood Hazard Maps**. Attached as **Annex A K**.
- 11. <u>District Wise Flood Hazard Vulnerability Matrix</u>. Attached as **Annex L R**.



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Response Guidelines

12. <u>Tiers of Response</u>

- a. <u>1st Tier</u>. Local emergency response by DDMAs with the support of District / Provincial / Army resources.
- b. **2nd Tier**. Provincial effort in support of District Authorities.
- c. <u>3rd Tier</u>. NDMA response (National effort / National resources) in support of Province (s) and AJ&K with / without external assistance.

13. **Preparedness**

- Response at National and Provincial levels will be configured against "Monsoon Contingency Scenario 1
 Moderately Above Normal Monsoon".
- b. Adequate safeguards / response measures will be undertaken for Monsoon Contingency Scenarios 2, 3 and 4
- c. **Armed Forces will be requisitioned by Provinces only** in case of emergency while keeping NDMA, informed. Aviation support will be coordinated centrally by NDMA based on request of Provinces and AJ&K. **Armed Forces will be employed** for following:-
 - (1) Rescue and relief operations by Field Units of Pak Army and Pak Navy (Sindh only).
 - (2) Aviation support including provision of C-130 by PAF (helicopters of only Pak Army and Ministry of Interior will be employed in Northern Areas and AJ&K).
 - (3) Support of drivers of Pak Army and Pak Navy.
 - (4) Special search and rescue operations for riverine floods.
 - (5) Medical support teams of all three services.
 - (6) Search and rescue in urban areas collapsed structures and landslides / avalanches by Pak Army teams.

d. Relief Goods - Non Food Items (NFIs)

- (1) Caseload for logistics / relief response will be worked out on the average of relief rendered during flood / related hazards from 2005 2015 (One decade) in respective district / regions / provinces by P/S/G/F DMA and ICT Disaster Management Cell.
- (2) Stockpiling of relief goods (NFIs) on envisaged caseload will be ensured at district level by P/S/G/F DMAs, forthwith in accordance with "NDMA Draft Guidelines on Stocking, Maintenance and Supply of Relief and Rescue Items". These Guidelines can be used as a reference to suit respective environment.
- (3) An effective mechanism of supply chain management must be established including prequalified suppliers for provision of food items, relief goods (NFIs) and transport contractors for emergency transportation.

e. Flood Rescue Measures

- (1) Availability as well as serviceability of flood rescue equipment (Boats, OBMs etc) will be ensured by all concerned. The equipment will be strategically placed so as to respond to flood contingencies in different regions.
- (2) Availability of **trained OBM Operators** must be coordinated and ensured during entire Monsoon Season.
- (3) Readiness of **Urban Search and Rescue (USAR) Teams** will be ensured for rescue operations in collapsed buildings / landslides in respective province or other provinces (when requisitioned).
- (4) USAR Teams will be put on alert for slide prone areas by respective Provinces. USAR Team for Balochistan will be provided through NDMA. Employment of Pak Army USAR Team will also be coordinated through NDMA.



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- (5) PDMAs to complete provision of flood equipment to Pak Army latest by 30th June 2016.
- f. <u>Dams Operations</u>. There must be an intimate coordination as per revised instructions / SOPs of Dam Management with all stakeholders so that response is generated well in time. Coordination conferences must be held before **30**th **June 2016**.

g. Flood Protection Works

- (1) Repair and maintenance of leftover **flood protection works** should be completed by **30**th **June 2016**.
- (2) Round the clock **vigilance of vulnerable sections of flood protection structures / bunds**, identified by respective Irrigation Departments will be ensured through Irrigation Staff, Police, Civil Defense, Volunteers and local community volunteers. **Incomplete flood protection works**, if any, will be particularly kept under special watch by respective provincial departments and PDMAs / DDMAs.
- (3) SOP on **breaching of bunds** must be rehearsed / practiced in presence of all stakeholders.

h. **Disaster Management Planning**

- (1) PDMAs to ensure **resource mapping** of volunteers (Civil Defense, Boy Scouts, Girl Guides), UN Agencies, NGOs / INGOs and ambulances at district level.
- (2) Location of relief camps must be earmarked and necessary administrative arrangements be made accordingly. It must be incorporated on **past experiences and should be need based**. Relief camps should be accessible / closer to main arteries so that relief goods are easily delivered to the affected persons. The reconnaissance / coordination must be completed by **25**th **June 2016**.
- (3) Coordination must be carried out with Civil Defense, Pakistan Boy Scouts Association and Pakistan Girl Guides Association at district level to provide support services at various relief camps under the overall guidance and supervision of the District Administration.
- (4) **FDMA** must ensure fool proof measures against rains / flash floods in relief camps established for **Internally Displaced Persons (IDPs)**.
- (5) Resource Mapping and prepositioning of **dedicated earth moving machinery** at landslide / flood water erosion prone highways / link roads and isolated mountainous areas of KP, AJ&K and GB by respective Governments. **NHA to ensure** such arrangements alongside Baily Bridges and enhanced number of maintenance teams at all critical sections especially KKH, Gilgit Skardu Road, Dir Chitral Road, Rawalpindi Murree Express Way and Kohala Muzaffarabad Road.
- (6) **Flood Contingency Plans** be updated by all concerned based on this Response Directive as well as respective SOP of planning process and shared with relevant stakeholders, **forthwith**.
- (7) To identify most vulnerable communities for sensitization, awareness, early warning and evacuation in emergency, district hazard maps must be updated upto Union Council level. Focus should be on following:-
 - (a) <u>Riverine Floods</u>. Settlements (encroachments) inside river plains (Kacha Area), communities living close to river banks / vulnerable sections identified by respective Irrigation Departments.
 - (b) Flash Floods. Settlements closer to / inside water course (s).
 - (c) <u>Landslides / Avalanches / GLOF</u>. Communities residing near dangerous slopes / known / potential landslide areas in mountainous regions.
 - (d) <u>Urban Flooding</u>. Low lying areas prone to ponding / inundation in congested city centers.
- (8) **To ward off danger of urban flooding**, municipal corporations of vulnerable urban centers



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must make following urgent arrangements:-

- (a) De-silting of storm water drains / sewerage drains.
- (b) Serviceability of pumping stations.
- (c) Assured provision including procurement and placement of heavy duty de-watering pumps at most vulnerable areas of each city center.
- (d) Provision of backup electricity arrangements in the form of generators for sewage disposal stations.
- (9) Availability of **gender and aged disaggregated data including that of disabled and old persons** at district level, must be ensured to cater for the needs of all segments of population, including vulnerable groups in rescue and relief operations.
- (10) Locations of relief camps must be identified and reconnaissance / coordination must be done by **30**th **June 2016**, at district level with all stakeholders.

i. Awareness Campaign

- (1) **Public Service Messages (PSMs)** through print / electronic media must be started forthwith by PDMAs / SDMA / GBDMA / FDMA / DDMAs.
- (2) All concerned **departments and local communities must be apprised** about Pre-Monsoon Forecast 2016 and its likely unfolding at the onset of Monsoon.
- (3) Community must be informed about safer places, relief camps and evacuation plans by concerned departments.

j. Stocking of Food Items

- (1) Provinces and AJ&K must ensure stocking of sufficient quantity of wheat and food items before 30th June 2016 in all areas which are vulnerable to floods and isolation, owing to possible severance of road links.
- (2) Pakistan Utility Stores Corporation (USC) will forward resource mapping alongwith inventory of items, contingency plan including capability of mobile utility stores to NDMA, PDMA and all concerned DDMAs by 25th June 2016. USC will further ensure maintenance of sufficient stock levels and supply chain to support community in all flood prone areas especially far flung areas of KP, GB, AJ&K and Balochistan.

k. Salient Preventive Measures during Monsoon

- (1) Landslides prone areas, hill torrents, seasonal nullahs and river plains must be identified by local communities with the ability to shift immediately to safer places, in case of emergency.
- (2) A bag containing important utility items like first aid medicines, dry ration, water, charged torch, radio set, mobile phone, cells, match box, candles, charged batteries, mosquito repellent / net, important documents including CNIC and some cash money should always be readily available.
- (3) Preventive measures against infectious / skin diseases and Cholera etc must be taken and vaccination done at first instance.
- (4) Vaccination of animals to be done and arrangements of fodder to be kept in sight.

14. Early Warning

- a. Flood Early Warning. PMD will be the Focal Organisation for providing flood early warning:-
 - (1) Flood Forecasting Division (Subordinate department of PMD), will disseminate Daily Floods Bulletin (Forecasts) during the Monsoon Season.
 - (2) Weather and flood forecast / advisory will be issued as per following schedule:-

(a) **Normal Conditions**

- i. Monthly First week of a starting month.
- ii. Weekly Every Monday.



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(b) At Onset of Floods

i. Normal - Every 24 hours.

ii. High / Very High - 6 hours.iii. Significant Event - Every hour.

iv. Extreme Event - Maximum permissible time before occurrence.

- (3) No other agency is allowed to issue any forecast on weather / flood. Only PMD's alert will be relayed by stakeholders.
- (4) **Weather advisory** / warning / flood alert for specific area (s) and time period will be issued by respective PDMAs to disseminate warning to District Authorities / Relevant Stakeholders via Fax / Email / Telephone / SMS etc.
- (5) PMD shall directly **issue the warnings** to NDMA, PDMAs, other related agencies and media through SMS, email, fax and immediately upload on its website.
- (6) PMD will nominate a **focal person** authorized to deal with weather and flood forecast which will be notified to all concerned and will be readily available to all stakeholders, when required.

b. **Community Early Warning**

- (1) NDMA will be the **focal agency** to collaborate with PTA for issuing of SMS alerts.
- (2) SMS will be drafted (160 Roman Udru letters) by respective PDMAs and forwarded to NDMA, 24 hours in advance.
- (3) Same SMS will be displayed on website of NDMA / PDMAs and shared with media.
- (4) To ward off panic and improper response, SMS will be **Tehsil / city specific** of the affected areas.
- (5) Community based **indigenous early warning system** must be institutionalized as part of response mechanism in areas vulnerable to flash floods, landslides, GLOF, avalanches. Special vigilance to be exercised during dark hours and periods of intense rains. The measures should include watchmen, loudspeakers / megaphones, whistles, SMS alerts, telephone calls or any other arrangements of similar nature.
- c. To ward off "False Warning", all DMAs will ensure implementation of Clause 35 of NDM Act 2010.

15. Onset of Flood and Rescue Phase

- a. **Availability of staff on holidays** must be ensured during Monsoon.
- b. Rescue 1122, Emergency Services, Civil Defense Services, Volunteers and Police / Law Enforcement Agencies will be incorporated during rescue operations.
- c. **Aviation effort** should be requisitioned through NDMA by respective Provincial Governments and AJ&K with a reaction time of 24 hours. Expenditures will be borne by respective Province.
- d. The forced evacuation must be planned in case of **limited warning time**, by utilising all available resources at provincial / district levels.
- e. DDMAs as first responders should **mobilize communities for disaster response**. This will encourage community involvement, strengthen their own efforts and also address the issue of dearth of human resources.
- f. **Priority in rescue / evacuation will be given to Vulnerable Groups** (aged, disabled, women and children) and their special needs must be met.
- g. **Evacuation must be planned in an orderly manner** and traffic congestions must be avoided.
- h. **NHA and Pakistan Railways** will restore the communication infrastructure / alternate routes, as early as possible.
- i. **SUPARCO** will provide satellite imageries and assesment for projected development of floods in affected areas to NDMA.
- j. Elaborate traffic arrangements be made for regulating traffic on National and Provincial arteries in case



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of damage to infrastructure by floods.

k. **Disaster tourism** must be curbed.

16. Relief Phase

- a. A standardized food pack must be designed as per local requirements to meet the needs of affected persons. Energy biscuits and other such food items which are not part of the daily diet of local community, be avoided. Instead items like rice, wheat bags, ghee and dry milk for babies etc, should be included.
- b. **Water purification tablets and filtration systems** for the provision of clean drinking water to affected persons must be stocked in advance.
- c. Relief management is the most significant part of response to any disaster. The main purpose of the relief management is to provide life sustaining commodities to the affected communities through a fair and organized system, therefore, **distribution method** should be decided in consultation with local communities.
- d. Based on the past experiences, need must be formalized and the list of relief goods should be available with all DMAs and displayed on websites to facilitate donors to provide need based relief goods in emergency.
- e. **Relief packages should be according to the region's cultural context** and food requirements be ensured for lactating mothers, pregnant women, infants, children and elderly persons. Stockpiling and contingency planning should incorporate special needs of older persons and persons with disabilities particularly with regards to special equipment such as wheel chairs etc and must be able to cater for the needs of family, as a whole.
- f. **Trained community level teams** should assist in planning and setting up emergency shelters, distributing relief among the affected people, identifying missing people and addressing needs of education, health care, water supply, sanitation and food etc of the affected community. Relief teams should also **engage active women from within the community** in distribution of food in the relief camps.
- g. Dignity of all the affected persons should be especially ensured during relief phase.

h. **Health**

- (1) **Disease Early Warning Systems** to be put in place by Provincial Health Departments, once a situation arises.
- (2) National Health Emergency Preparedness and Response Network should establish liaison and necessary coordination with Provincial health authorities. District and City Administration should prepare for Monsoon Season ahead of time by ensuring that Anti Dengue and Malaria drives commence promptly and spraying and removal of stagnant water is done at priority basis. Health Authorities must ensure that medicines and vaccines are stockpiled at all locations so as to ensure availability in case of any eventuality. Health authorities must also ensure that appropriate mosquito nets are available in all health facilities and are also placed at lowest possible tier for distribution.

i. Supply Chain of Relief Goods

- (1) The **supply chain must be maintained** and followed in true letter and spirit. DDMAs are the first tier supported by PDMAs to provide immediate relief. Similarly, second tier (PDMAs supported by NDMA) should be ready to render assistance once the stocks of DDMAs are exhausted. Third Tier is of NDMA supported by National resources to extend relief support required by the provinces.
- (2) NDMA maintains its stocks at strategic locations (Annex T). PDMAs are responsible to collect the stocks once released by NDMA from a particular location.
- (3) NDMA stocks will be requisitioned only in case of extreme emergency and with sufficient



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reaction time.

(4) **Distribution of tents at site must be avoided**. People must be motivated to come to relief camps.

17. Post Flood Rehabilitation Phase

a. **Damage Assessment**

- (1) NDMA's "Draft Guidelines for Minimum Compensation to Persons Affected by Natural and Manmade Disasters" may be followed by PDMAs /SDMA /GBDMA /FDMA. These Guidelines can be used as reference to suit respective environment.
- (2) In case of any need, the **Multi Sector Initial Rapid Assessment (MIRA)** module developed jointly by NDMA and UNOCHA will be deployed for which PDMAs / DDMAs will be required to provide requisite human resource, trained for the module.
- b. **SUPARCO** will provide imageries for damage assesment to NDMA.
- c. Due assistance will be sorted from **humaniterian response organizations**, if required.
- d. Punishment for false claims will be dealt with as per Clause 34 of NDM Act 2010.

18. <u>Information Management</u>

- a. NDMA, P/S/G/F DMAs will **update respective websites** on 12 hourly basis during entire Monsoon Season. In case of a significant activity / event / flood situation, it will be updated on 3 6 hours basis.
- b. **Print and electronic media / internet** be utilized for dissemination of timely and accurate information.
- c. **Regular press releases, media tickers and press briefings** will be ensured to present real time picture of ongoing activities, developing situations and losses / damages, if any.
- d. **To ensure post transmission record as well as redundancy**, information will be disseminated through SMS, emails, fax, letter and telephones.
- e. **SMS / WhatsApp Applications Groups** of relevant stakeholders will be made to ensure real time information sharing.
- f. NDMA and PMD will notify an authorized spokesperson each, for interaction with media and issuance of official press releases. Joint press briefings will be organized by NDMA and PMD, when required. Mr Ahmed Kamal (Member DRR) is authorized Spokesperson of NDMA. His contact details are 0300-5278981 and 051-9087830.
- 19. <u>Needs of Vulnerable Groups</u>. Following aspects must be kept in special focus during all stages of flood disaster management in addition to points already stated above:
 - a. Relief sites and camps should ensure attention to **women's security needs** like separate wash-rooms with locks, adequate lights, water and sanitation facilities etc.
 - b. Women's fair and equitable access to **basic services** should be ensured, particularly in health and hygiene.
 - c. **Female doctors and psychosocial support** personnel should be made available for women and children.
 - d. **Mobile medical units** equipped with safe delivery, post-natal facilities and referral should be in place.
 - e. Camp management agency should ensure that the registration, profiling and mapping systems record **disaggregated data** on age, gender and vulnerabilities so as to identify people with specific needs (PWSN) at the earliest stages of entering in the site and throughout the duration of stay in camp.

20. **Coordinating Instructions**

Emergency Operation Centers will start functioning in NDMA, P/S/G/F DMAs, CDA, Pakistan Armed Forces and all relevant Departments involved in Flood Management / Flood Disaster Management, as per respective Standing Operating Procedures (SOPs) from 25th June 2016 and will be closed by 15th October 2016, unless Monsoon is prolonged. This Directive will be taken as Authority for incurring all expenditures.

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- b. **Liaison Officers for National Emergency Operation Center (NEOC)** (Including Reserves or NEXT FOR) from different stakeholders dealing with floods like Pakistan Armed Forces, FFC, FFD, PMD, SUPARCO etc be nominated forthwith.
- c. NDMA will hold daily **Coordination Conference** during a flood situation in NEOC at 0900 hours. All Liaison Officers will attend the Conference.
- d. **PMD will share in advance the information about any significant event** with NDMA as per SOP in vogue, for formal interpretation and timely initiation of requisite actions without creating any panic.
- e. **Coordination Meetings** amongst relevant stakeholders at National / Provincial / Regional / District levels should be held **twice daily**, once at the start of the day and once at night to ensure that all required coordination measures are taken in timely fashion and that accurate information is prepared for daily situation reports.
- f. Coordination with UN Agencies and INGOs / NGOs
 - (1) The **support of UN Agencies and INGOs / NGOs** will be utilised in a coordinated manner, mostly in preparedness, relief, post disaster assessments and rehabilitation phases.
 - (2) NDMA, P / S / G / F DMAs will be in **lead role to regulate and direct** the employment of these organisations which must be demand based and does not cause saturation.
 - (3) The **capabilities of each organisation** must be ascertained to ensure its optimal utilisation / employment.
 - (4) **NGOs / INGOs duly cleared / approved** by concerned ministries will be allowed to assist relief operations.

g. Reports and Returns

- (1) **Situation Report** will be submitted to NDMA by PDMAs, DDMAs, PMD, FFC, FFD and NHA as per recently issued SITREP SOP.
- (2) NDMA / PMD / PDMAs / SDMA / GBDMA / FDMA / ICT Disaster Management Cells will update the situation on their websites after every 6 12 hours.
- (3) **SUPARCO** will provide the imageries of developing situations on daily basis.
- h. **NHN / PHF / UN Agencies and PRCS** will share location of their stocks and human resource mapping with NDMA / PDMAs by **30**th **June 2016**, so that relief assistance is well coordinated.
- i. Important telephone numbers from NDMA perspective are shared at **Annex U**. All PDMAs / relevant stakeholders will prepare **telephone directory** of respective Provinces / Regions by **25**th **June 2016** and share it with NDMA and also host it at respective website.
- j. Following ministries / departments are requested for assistance as mentioned against each:-
 - (1) Ministry of Defense for conduct of relief / rescue operations through Pakistan Armed Forces.
 - (2) **Ministry of Interior and Anti-Narcotics Force** for availability of Aviation assets for emergency response, at a short notice.
 - (3) Pakistan Electronic Media Regulatory Authority (PEMRA) for airing of Public Service Messages for community awareness on all media channels during prime hours.
 - (4) **Pakistan Telecommunication Authority (PTA)** to facilitate generation of SMS Alerts for early warning, emergency relief and evacuation.
 - (5) **Ministry of Tourism** for provision of timely weather / flood related information to tourists including dangers of flash floods, landslides, GLOF etc and help evacuation of stranded tourists through local Government / Pakistan Armed Forces.
- k. Facility of a dedicated **Video Conference System (VCS)** is available at NDMA. Necessary hardware (Cameras) and Software (Polycom Real Presence) is also held with PDMAs to connect to the NDMA VCS. Same may be utilized for effective communication during Monsoon 2016. Necessary details of the system are as under:-
 - (1) NDMA Live IP Address: 203.124.39.71
 - (2) Point of Contact (POC): ICT Directorate NDMA.
 - (3) Alternate Skype ID:ndmapk



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(4) Prior coordination for setting up of video conference besides its testing is required as per SOP. 21. **Conclusion**. Monsoon being a recurring phenomenon merits better preparedness, efficient coordination and proactive approach by all stakeholders. The negative impact of floods can be reduced through vigilance and configuring timely, correct and integrated response against any impending situation. Implementation of steps highlighted in this Directive are expected to meet the challenges of forthcoming Monsoon Season in a befitting manner.

Government of Pakistan Ministry of Climate Change National Disaster Management Authority (Prime Minister's Office), Islamabad.

Dated: 15 June 2016

Lieutenant Colonel For Chairman NDMA (Khuda Bakhsh)

Telephone No : 051-9205035 Fax No: 051 - 9205086

<u>Distribution List</u>. Attached.

Annexes

Α	-	Flood Hazard Map – Punjab
В	-	Flood Hazard Map – Sindh

C - Flood Hazard Map – Balochistan

Flood Hazard Map – Khyber PakhtunkhwaFlood Hazard Map – Azad Jammu & Kashmir

F - Flood Hazard Map - Gilgit Baltistan

G - Flood Hazard Map – FATA

H - Flood Hazard Map – Pakistan

I - GLOF Hazard Map – Pakistan

J - Avalanche Hazard Map – PakistanK - Landslide Hazard Map – Pakistan

District Wise Flood Hazard Vulnerability Matrix – Punjab
District Wise Flood Hazard Vulnerability Matrix – Sindh

N - District Wise Flood Hazard Vulnerability Matrix— Balochistan

O - District Wise Flood Hazard Vulnerability Matrix – Khyber Pakhtunkhwa
P - District Wise Flood Hazard Vulnerability Matrix – Azad Jammu & Kashmir

Q - District Wise Flood Hazard Vulnerability Matrix – Gilgit Baltistan

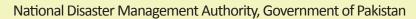
R - District Wise Flood Hazard Vulnerability Matrix – FATA

S - Flood Relief Equipment of Pak Army

T - Country Wide Location of NDMA Warehouses

U - Important Contact Numbers







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10.	Headquarters Sindh Rangers (Operations Branch), Karachi	1	1
11.	Headquarters Frontier Corps (Operations Branch), Khyber Pakhtunkhawa, Peshawar	1	1
12.	Headquarters Frontier Corps (Operations Branch), Balochistan, Quetta	1	1
13.	Commanding Officer, 6 Army Aviation Squadron, Islamabad	1	1
14.	Headquarters Anti Narcotic Force (Operations Branch), Rawalpindi	1	1





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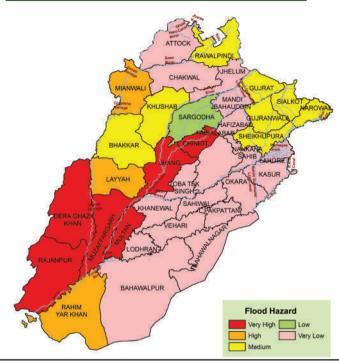


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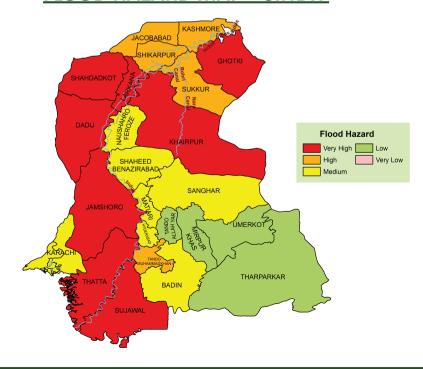
Annex A

FLOOD HAZARD MAP – PUNJAB



Annex B

FLOOD HAZARD MAP – SINDH



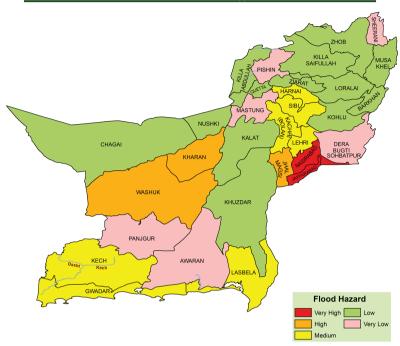


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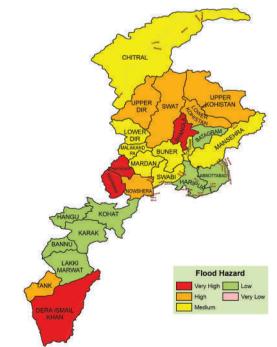
Annex C

FLOOD HAZARD MAP – BALOCHISTAN

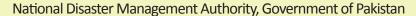


Annex D

FLOOD HAZARD MAP - KHYBER PAKHTUNKHWA









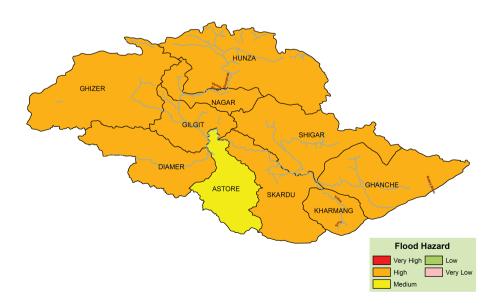
Annex E

FLOOD HAZARD MAP - AZAD JAMMU & KASHMIR (AJ&K)



Annex F

FLOOD HAZARD MAP - GILGIT BALTISTAN (GB)



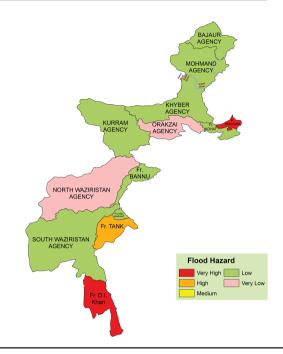


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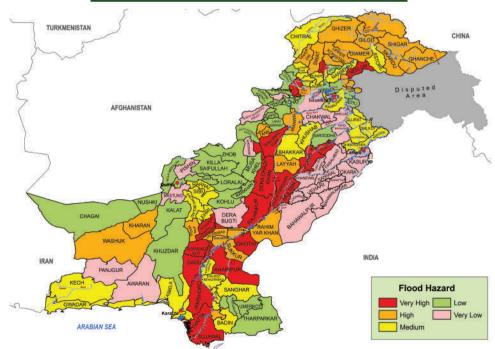
Annex G

FLOOD HAZARD MAP – FATA



Annex H

FLOOD HAZARD MAP - PAKISTAN





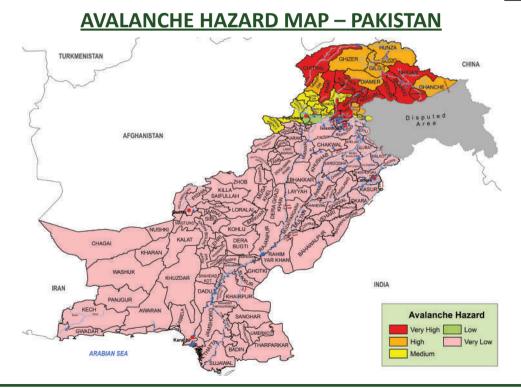
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Annex I



Annex J



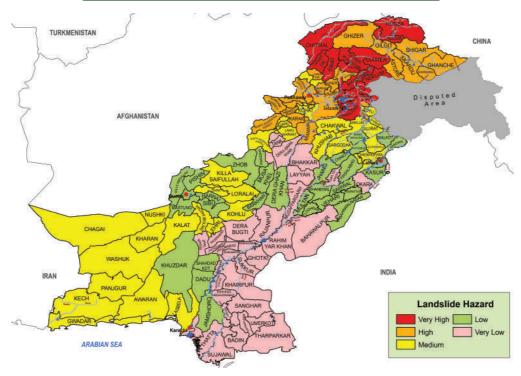


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Annex K

LANDSLIDE HAZARD MAP – PAKISTAN





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Annex L

<u>DISTRICT WISE FLOOD HAZARD VULNERABILITY MATRIX – PUNJAB</u>

District	Flood Hazard	Riverine Flood	Flash Flood	Urban Flood	Land Slide	Avalanche	GLOF
D. G. Khan	Very High	Yes	Yes	No	No	No	No
Rajanpur	Very High	Yes	Yes	No	No	No	No
Layyah	High	Yes	No	No	No	No	No
Mianwali	High	Yes	Yes	Yes	Yes	No	No
Muzaffargarh	High	Yes	No	No	No	No	No
Rahim Yar Khan	High	Yes	No	No	No	No	No
Bhakkar	Medium	Yes	No	No	No	No	No
Gujranwala	Medium	Yes	No	No	No	No	No
Gujrat	Medium	Yes	No	No	No	No	No
Jhang	Medium	Yes	No	No	No	No	No
Khushab	Medium	Yes	Yes	No	Yes	No	No
Narowal	Medium	Yes	No	No	No	No	No
Rawalpindi	Medium	Yes	Yes	Yes	Yes	No	No
Sheikhupura	Medium	Yes	No	No	No	No	No
Sialkot	Medium	Yes	No	No	No	No	No
Multan	Low	Yes	No	Yes	No	No	No
Sargodha	Low	Yes	No	No	No	No	No
Attock	Very Low	Yes	Yes	No	Yes	No	No
Bahawalnagar	Very Low	Yes	No	No	No	No	No
Bahawalpur	Very Low	Yes	No	No	No	No	No
Chakwal	Very Low	Yes	Yes	No	Yes	No	No
Chiniot	Very Low	Yes	No	No	No	No	No
Faisalabad	Very Low	Yes	No	No	No	No	No
Hafizabad	Very Low	Yes	No	No	No	No	No
Jhelum	Very Low	Yes	Yes	No	No	No	No
Kasur	Very Low	Yes	No	No	No	No	No
Khanewal	Very Low	Yes	No	No	No	No	No
Lahore	Very Low	Yes	No	Yes	No	No	No
Lodhran	Very Low	No	No	No	No	No	No
Mandi Bahauddin	Very Low	Yes	No	No	No	No	No
Nankana Sahib	Very Low	Yes	No	No	No	No	No
Okara	Very Low	Yes	No	No	No	No	No
Pakpattan	Very Low	Yes	No	No	No	No	No
Sahiwal	Very Low	Yes	No	No	No	No	No
Toba Tek Singh	Very Low	Yes	No	No	No	No	No
Vehari	Very Low	No	No	No	No	No	No



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Annex M

DISTRICT WISE FLOOD HAZARD VULNERABILITY MATRIX – SINDH

District	Flood Hazard	Riverine Flood	Flash Flood	Urban Flood	Land Slide	Avalanche	GLOF
Dadu	Very High	Yes	No	No	No	No	No
Ghotki	Very High	Yes	No	No	No	No	No
Jamshoro	Very High	Yes	No	No	No	No	No
Khairpur	Very High	Yes	No	No	No	No	No
Larkana	Very High	Yes	No	No	No	No	No
Qamber Shahdadkot	Very High	Yes	No	No	No	No	No
Sujawal	Very High	Yes	No	Yes	No	No	No
Thatta	Very High	Yes	No	Yes	No	No	No
Jacobabad	High	Yes	No	No	No	No	No
Kashmore	High	Yes	No	No	No	No	No
Shikarpur	High	Yes	No	No	No	No	No
Sukkur	High	Yes	No	No	No	No	No
Tando Muhammad Khan	High	Yes	No	No	No	No	No
Hyderabad	Medium	Yes	No	Yes	No	No	No
Matiari	Medium	Yes	No	No	No	No	No
NaushahroFeroze	Medium	Yes	No	No	No	No	No
Nawabshah	Medium	Yes	No	No	No	No	No
Badin	Medium	No	No	Yes	No	No	No
Karachi	Medium	No	No	Yes	No	No	No
Sanghar	Medium	No	No	Yes	No	No	No
Mirpur Khas	Low	Yes	No	No	No	No	No
Tando Allahyar	Low	Yes	No	No	No	No	No
Tharparkar	Low	No	No	No	No	No	No
Umerkot	Low	No	No	No	No	No	No

Very High	High Med	dium Lov	v Very Low
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Annex N

DISTRICT WISE FLOOD HAZARD VULNERABILITY MATRIX – BALOCHISTAN

District	Flood Hazard	Riverine Flood	Flash Flood	Urban Flood	Land Slide	Avalanche	GLOF
Jaffarabad	Very High	Yes	Yes	No	No	No	No
Sohbatpur	Very High	Yes	Yes	No	No	No	No
Nasirabad	Very High	Yes	Yes	No	No	No	No
Jhal Magsi	High	Yes	No	No	No	No	No
Kharan	High	No	No	No	No	No	No
Washuk	High	No	No	No	No	No	No
Bolan	Medium	Yes	Yes	No	Yes	No	No
Gwadar	Medium	No	Yes	Yes	Yes	No	No
Harnai	Medium	No	Yes	No	No	No	No
Kech	Medium	No	Yes	No	No	No	No
Lehri	Medium	No	No	No	No	No	No
Lasbela	Medium	No	No	No	No	No	No
Sibi	Medium	Yes	Yes	No	No	No	No
Barkhan	Low	No	Yes	No	No	No	No
Chagai	Low	No	Yes	No	No	No	No
Kalat	Low	No	Yes	No	Yes	No	No
Khuzdar	Low	No	Yes	No	No	No	No
Killa Abdullah	Low	No	Yes	No	No	No	No
Killa Saifullah	Low	No	Yes	No	Yes	No	No
Kohlu	Low	No	Yes	No	No	No	No
Loralai	Low	No	Yes	No	No	No	No
Musakhel	Low	No	Yes	No	No	No	No
Nushki	Low	No	Yes	No	No	No	No
Quetta	Low	No	Yes	Yes	No	No	No
Zhob	Low	No	Yes	No	No	No	No
Awaran	Very Low	No	No	No	No	No	No
Dera Bugti	Very Low	No	Yes	No	No	No	No
Mastung	Very Low	No	Yes	No	No	No	No
Panjgur	Very Low	No	No	No	No	No	No
Pishin	Very Low	No	Yes	No	No	No	No
Sherani	Very Low	No	Yes	No	No	No	No
Ziarat	Very Low	No	Yes	No	No	No	No

Very High	High	Medium	Low	Very Low



National Disaster Management Authority, Government of Pakistan



Annex O

DISTRICT WISE FLOOD HAZARD VULNERABILITY MATRIX- KP

District	Flood Hazard	Riverine Flood	Flash Flood	Urban Flood	Land Slide	Avalanche	GLOF
Charsadda	Very High	Yes	No	No	No	No	No
D. I. Khan	Very High	Yes	Yes	Yes	No	No	No
Peshawar	Very High	Yes	No	Yes	No	No	No
Shangla	Very High	Yes	Yes	No	Yes	Yes	Yes
Upper Kohistan	High	Yes	Yes	No	Yes	Yes	Yes
Lower Kohistan	High	Yes	Yes	No	Yes	Yes	Yes
Nowshera	High	Yes	Yes	Yes	Yes	No	No
Swat	High	Yes	Yes	No	Yes	Yes	Yes
Tank	High	Yes	Yes	No	No	No	No
Upper Dir	High	Yes	Yes	No	Yes	Yes	Yes
Buner	Medium	No	Yes	No	Yes	Yes	No
Chitral	Medium	Yes	Yes	No	Yes	Yes	Yes
Lower Dir	Medium	Yes	Yes	No	Yes	Yes	No
Malakand	Medium	Yes	Yes	No	Yes	No	No
Mansehra	Medium	Yes	Yes	No	Yes	No	No
Torghar	Medium	Yes	Yes	No	Yes	Yes	No
Mardan	Medium	Yes	No	Yes	No	No	No
Swabi	Medium	Yes	Yes	No	Yes	No	No
Abbotabad	Low	No	Yes	No	Yes	No	No
Bannu	Low	Yes	No	No	No	No	No
Batagram	Low	No	Yes	No	Yes	No	Yes
Hangu	Low	No	Yes	No	No	No	No
Haripur	Low	No	No	No	Yes	No	No
Karak	Low	No	Yes	No	No	No	No
Kohat	Low	No	No	Yes	Yes	No	No
LakkiMarwat	Low	Yes	No	No	No	No	No

Very High	High	Medium	Low	Very Low
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National Disaster Management Authority, Government of Pakistan



Annex P

DISTRICT WISE FLOOD HAZARD VULNERABILITY MATRIX – AJ&K

District	Flood Hazard	Riverine Flood	Flash Flood	Urban Flood	Land Slide	Avalanche	GLOF
Neelum	Very High	Yes	Yes	No	Yes	Yes	No
Bagh	High	Yes	Yes	No	Yes	No	No
Hattian	High	Yes	Yes	No	Yes	No	No
Haveli	High	Yes	Yes	No	Yes	No	No
Muzaffarabad	High	Yes	Yes	No	Yes	No	No
Bhimber	Medium	No	Yes	No	No	No	No
Kotli	Low	Yes	Yes	No	Yes	No	No
Poonch	Low	Yes	Yes	No	Yes	No	No
Sudhnoti	Low	Yes	Yes	No	Yes	No	No
Mirpur	Very Low	No	No	No	No	No	No

Very High High	Medium	Low	Very Low
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Annex Q

DISTRICT WISE FLOOD HAZARD VULNERABILITY MATRIX – GB

District	Flood Hazard	Riverine Flood	Flash Flood	Urban Flood	Land Slide	Avalanche	GLOF
Diamer	High	Yes	Yes	No	Yes	Yes	No
Ghanche	High	Yes	Yes	No	Yes	Yes	Yes
Ghizer	High	No	Yes	No	Yes	Yes	Yes
Gilgit	High	Yes	Yes	No	Yes	Yes	Yes
Hunza	High	Yes	Yes	No	Yes	Yes	Yes
Skardu	High	Yes	Yes	No	Yes	Yes	Yes
Nagar	High	No	Yes	No	Yes	Yes	Yes
Kharmang	High	No	Yes	No	Yes	Yes	Yes
Shigar	High	Yes	Yes	No	Yes	Yes	Yes
Astore	Medium	No	Yes	No	Yes	Yes	No

Very High	High	Medium	Low	Very Low
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National Disaster Management Authority, Government of Pakistan



Annex R

DISTRICT WISE FLOOD HAZARD VULNERABILITY MATRIX – FATA

District	Flood	Riverine Flood	Flash Flood	Urban Flood	Land Slide	Avalanche	GLOF
Bajaur Agency	Low	Yes	Yes	No	Yes	No	No
Khyber Agency	Low	No	Yes	No	Yes	No	No
Kurrum Agency	Low	No	Yes	No	Yes	No	No
Mohmand Agency	Low	No	Yes	No	Yes	No	No
South Waziristan Agency	Low	Yes	Yes	No	Yes	No	No
FR Bannu	Very Low	No	No	No	No	No	No
FR D. I. Khan	Very Low	No	Yes	No	Yes	No	No
FR Kohat	Very Low	No	Yes	No	No	No	No
FR LakkiMarwat	Very Low	No	No	No	No	No	No
FR Peshawar	Very Low	No	Yes	No	No	No	No
FR Tank	Very Low	No	No	No	No	No	No
North Waziristan Agency	Very Low	No	Yes	No	Yes	No	No
Orakzai Agency	Very Low	No	Yes	No	Yes	No	No

Very High	High Medium	Low	Very Low
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Annex S

FLOOD RELIEF EQUIPMENT OF PAK ARMY

Serial	Items	Punjab	Balochistan	Sindh	KP	Total Quantity
1.	Fibre Glass Boats	640	25	152	56	873
2.	OBM 15 HP	277	-	26	-	303
3.	OBM 25 HP	128	-	148	18	294
4.	OBM 30 HP	126	21	23	90	260
5.	OBM 40 HP	114	-	5	-	119
6.	OBM 45 HP	22	-	-	-	22
7.	OBM 48 HP	-	-	18	-	18
8.	OBM 55 HP	52	-	-	-	52
9.	Life Ring	402	32	8	-	442
10.	Life Jackets	4790	200	1521	158	6669
11.	Search Lights	164	8	35	19	226
12.	Willkie Talkie Sets	167	-	-	-	167
13.	De-Watering Pumps	27	6	119	-	152
14.	Generator Sets	37	-	-	7	44
15.	GPS	-	-	6	-	6
16.	Paddles	1059	36	139	-	1234
17.	Buoys	513	14	-	4	531
18.	Boilers	542	14	-	4	560
19.	Bath Hook	65	10	-	-	75
20.	Anchor	39	-	87	4	130
21.	Sand Bags	2368	-	-	1526	3894



National Disaster Management Authority, Government of Pakistan



Annex T

COUNTRY WIDE LOCATION OF NDMA WAREHOUSES

1. Strategic Humaniterian Response Facilities (HRFs)

Serial	Location	No of Sheds				
Serial	Location	PDMA	NDMA	Total		
a.	Jallozai / KP	3	1	4		
b.	Lahore / Punjab	3	1	4		
C.	Muzaffargarh / Punjab	2	1	3		
d.	Jamshoro / Sindh	2	1	3		
e.	Sukkur / Sindh	2	1	3		
f.	Quetta / Balochistan	3	1	4		

- 2. **NDMA Warehouses**. In addition to strategic HRFs, NDMA has following warehouses in the Country:
 - a. Punjab
 - (1) Rawalpindi (Central stock to support Punjab / KP / FATA / AJ&K / GB / ICT).
 - (2) Lahore.
 - b. Sindh
 - (1) Karachi.
 - (2) Kashmore (Central stock to support Sindh / Balochistan).
 - c. <u>Balochistan</u>. Quetta.
 - d. <u>AJ&K</u>. Muzaffarabad.
 - e. **GB**
 - (1) Gilgit.
 - (2) Skardu.



National Disaster Management Authority, Government of Pakistan



IMPORTANT TELEPHONE NUMBERS

Annex U

Serial	Department	Contact Number
1.	National Emergency Operation Centre (NEOC), NDMA Islamabad	051-9205037
		Fax -051-9205086
		UAN-051-111-157-157
2.	Provisional Emergency Operations Centre (PEOC), PDMA Punjab	042-99204408
		042-99203163
		042-36371839
3.	Provisional Emergency Operations Centre (PEOC), PDMA Sindh	021-99239524
4.	Provisional Emergency Operations Centre (PEOC), PDMA Balochistan	081-9241133,
	Trovisional Emergency operations contro (1 200), 1 21111 (2000)	081-2881168
5.	Provisional Emergency Operations Centre (PEOC) PDMA Khyber	091-9213845
	Pakhtunkhwa	091-9223662
		091-9213959
6.	State Disaster Management Authority (SDMA) Emergency Operation	05822-921643
0.	Centre, AJ&K	000 0_1010
7.	GBDMA Emergency Operation Centre, Gilgit Baltistan	05811-920874
8.	Capital Disaster Management Authority Islamabad	051-9253001,
	3	051-9253003, 05, 07
9.	FATA Emergency Operation Centre, Peshawar	091-9216336
		091-9216864
		091-9218351
10.	Pakistan Meteorological Department (PMD)	051-9250367.
	The state of the s	051-9250595
11.	Flood Forecasting Division (FFD)	042-99200139
12.	Army Flood Control Centre, Engineer Directorate	051-5202059 / 5202060
	_ · ····, · · · · · · · · · · · · · · ·	0331-9264145 (Con room)
13.	Director General NHEPRN	051-9255709, 08
14.	Federal Flood Commission	051-9244604
	1 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	Con Room 051-9244616
15.	IRSA, Islamabad	051-9108013-14, 9108008
16.	SUPARCO, Islamabad	051-9075260
17.	Nullah Lai Control Room	051-9250566
18.	Rescue 1122, Rawalpindi	051-9291185
19.	DG, Rescue 1122, Punjab	042-37421122
20.	DG, Rescue 1122, Khyber Pakhtunkhwa	091-9222483-4
21.	DG, Rescue 1122, Azad Jammu & Kashmir	05822-921335
22.	DG, Rescue 1122, Gilgit Baltistan	05811-922137, 922135
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23.	Geological Survey of Pakistan, Islamabad	051-9257182, 9255141
24.	COMKAR Karachi	021-48506113
25.	Pakistan Maritime Security Agency Karachi	021-48508851
00	Manala Harakuraka Ohanmatam	021-99214624
26.	Marala Headworks Observatory	052-35021027
27.	PCIW (Pakistan Commission Indus Water) Lahore	042-99212783, 86
28.	GM, Pakistan Railway Lahore	042-99201700
29.	Punjab Irrigation Department	042-99212117-8
30.	Balochistan Irrigation Department	081-9201074
31.	Sindh Irrigation Department	021- 99211445, 99211451
32.	Azad Jammu & Kashmir Irrigation Department	05822-921596, 921157
33.	Khyber Pakhtunkhwa Irrigation Department	091-9210845, 9212116
34.	Civil Defence Punjab	042-99212104, 99212111
35.	Civil Defence Sindh	021-99215667, 99215665
36.	Civil Defence Peshawar	091-9212176, 2263158
37.	Civil Defence Balochistan	081-9203514, 13
38.	Terbela Dam	0938-281185
39.	Mangla Dam	0544-639353
40.	Rawal Dam	051-9255756-58
41.	PCIW	042-99212783