









# Funded by

MeitY and DST Govt. of India

## Implemented by

C-DAC, Pune

## Collaborators

IISC, Bangalore

PEC, Chandigarh

#### llser

Central Water Commission
State Water Resources Department
State Disaster Management Authority
District Administration

## Implemented for

Mahanadi River Basin (pilot)

All River Basins of India

## System requirement

**High Performance Computing** 

## Services Available

Technical Support

Installation and Setup

Maintenance

**Application Support** 

Hardware Support

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# Early Warning & Flood Prediction for River Basins of India

# **OBJECTIVES**

Early Warning System for Flood Prediction (EWS-FP) in the River Basins of India on HPC system

Sediment Transport model and Integrated Reservoir Operation tools

Geospatial portal for information dissemination on flood prediction

# **SALIENT FEATURES & OUTCOMES**

Model is scalable and flexible

Free and Open Source Technology

3-davs forecast for Mahanadi River Basin

Flood inundation (submerged) maps and Water level forecast

Village-level percentage inundation information

# **TECHNOLOGY**

Free and Open Source Software

Geo Server

Front End: React Web Appl.

Back End Server : Django REST

Database: Mongo DB

## SOCIETAL IMPACT

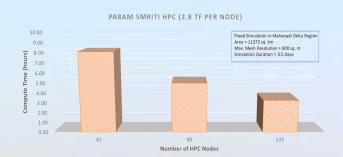
Advance flood information (Inundation extent and Water Level) to help disaster managers and stakeholders for planning flood mitigation measures and informed decision making





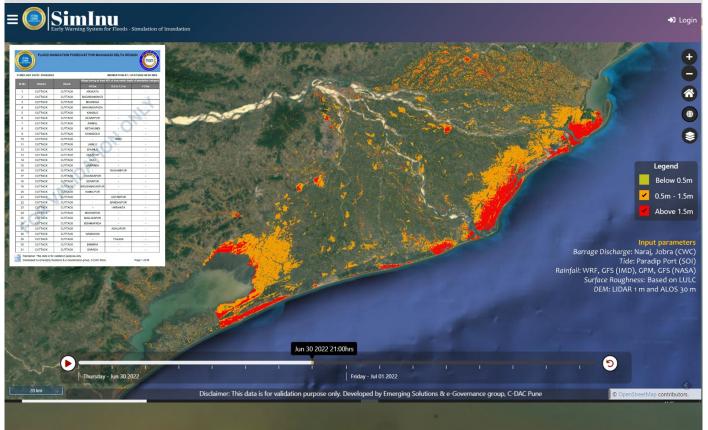
# **NSM Infrastructure**

**Param Series of Indigenous Supercomputers** 





# FLOOD SIMULATION OF MAHANADI DELTA USING PARAM SUPERCOMPUTERS



## CONTACT

Emerging Solutions & e-Governance group

Centre for Development of Advanced Computing

Innovation Park, Panchawati, Pashan, Pune -411 008 MAHARASHTRA

+91-20-2550233



