

Dam: Shapai

Country: China

River: Caopohe

31°18'57.09"N 103°22'14.55"E

31.315859 103.370705

Owner/Client: Sichuan Minjiang Hydropower Co. Ltd.

Designer/Engineer: Chengdu Hydroelectric Investigation and Design Institute, MOE & MWR

Contractor: 8th Construction Bureau, MOE & MWR

Purpose (code): H

Site start: 16.06.1997

RCC start: 29.03.2000

RCC completion: 30.05.2002

Site completion: 01.04.2003

Height (m): 132

Length (m): 230

Volume of RCC (m<sup>3</sup>x10<sup>3</sup>): 380

Total volume (m<sup>3</sup>x10<sup>3</sup>): 392

Reservoir capacity (m<sup>3</sup>x10<sup>6</sup>): 18

Upstream slope: V  
0.10

Forming of upstream face (code): (3')

Downstream slope: 0.21

Forming of downstream face (code): (3)

Spillway slope: crest  
0.21

Forming of spillway face (code): (1)

Depth of layers (mm): 300

Depth of lifts (mm): 300

Cement content (kg/m<sup>3</sup>): 108  
89

Pozzolan content (kg/m<sup>3</sup>): 72  
89

Code for pozzolan: (F)

RCCDAM Unique Serial No.: RCCDAM0275

## Under Construction



RCCDAM0275UC

## Completed Dam



RCCDAM0275CD

# Guide to Abbreviations

## Purpose

- E Environmental
- F Flood control
- G Groundwater recharge
- H Flood control
- I Irrigation
- N Navigation
- P Pollution control
- R Recreation
- W Water supply

## Facing method

- (1) Traditional concrete against formwork
- (2) Traditional concrete against formwork with external geomembrane
- (3) RCC against formwork
- (4) RCC against formwork with external geomembrane
- (5) Traditional concrete against precast concrete panels
- (6) Traditional concrete against precast concrete panels with geomembrane
- (7) RCC against precast concrete panels
- (8) RCC against precast concrete panels with geomembrane
- (9) RCC against precast concrete panels with hot poured membrane
- (10) RCC against precast concrete blocks
- (11) Reinforced conventional concrete cast before RCC placement
- (12) Reinforced conventional concrete cast after RCC placement
- (13) Reinforced concrete cast against precast units or slip-formed facing elements
- (14) Slip-formed/extruded facing elements
- (15) RCC supported by fill shoulders
- (16) Mechanically compacted unformed face of RCC
- (17) Unformed face of RCC
  - ' GEVR/GE-RCC
  - \* Stepped face

## Pozzolans

- (-) No Pozzolan Used
- (C) High-lime flyash (ASTM Class C)
- (F) Low-lime flyash (ASTM Class F)
- (M) Milled sand
- (N) Natural pozzolan (ASTM Class N)
- (R) ROLAC (mixture of flyash and slag with or without limestone fines)
- (S) Ground-granulated blast-furnace slag
- (L) Mixture of GGBFS and limestone fines