

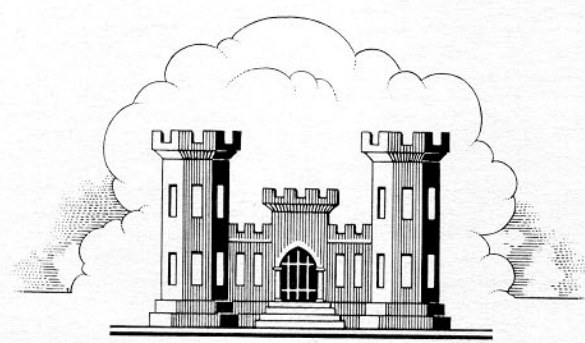
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VIRGIN RIVER AND TRIBUTARIES, NEVADA, ARIZONA, AND UTAH
MEADOW VALLEY WASH AND TRIBUTARIES, NEVADA

RESERVOIR REGULATION MANUAL

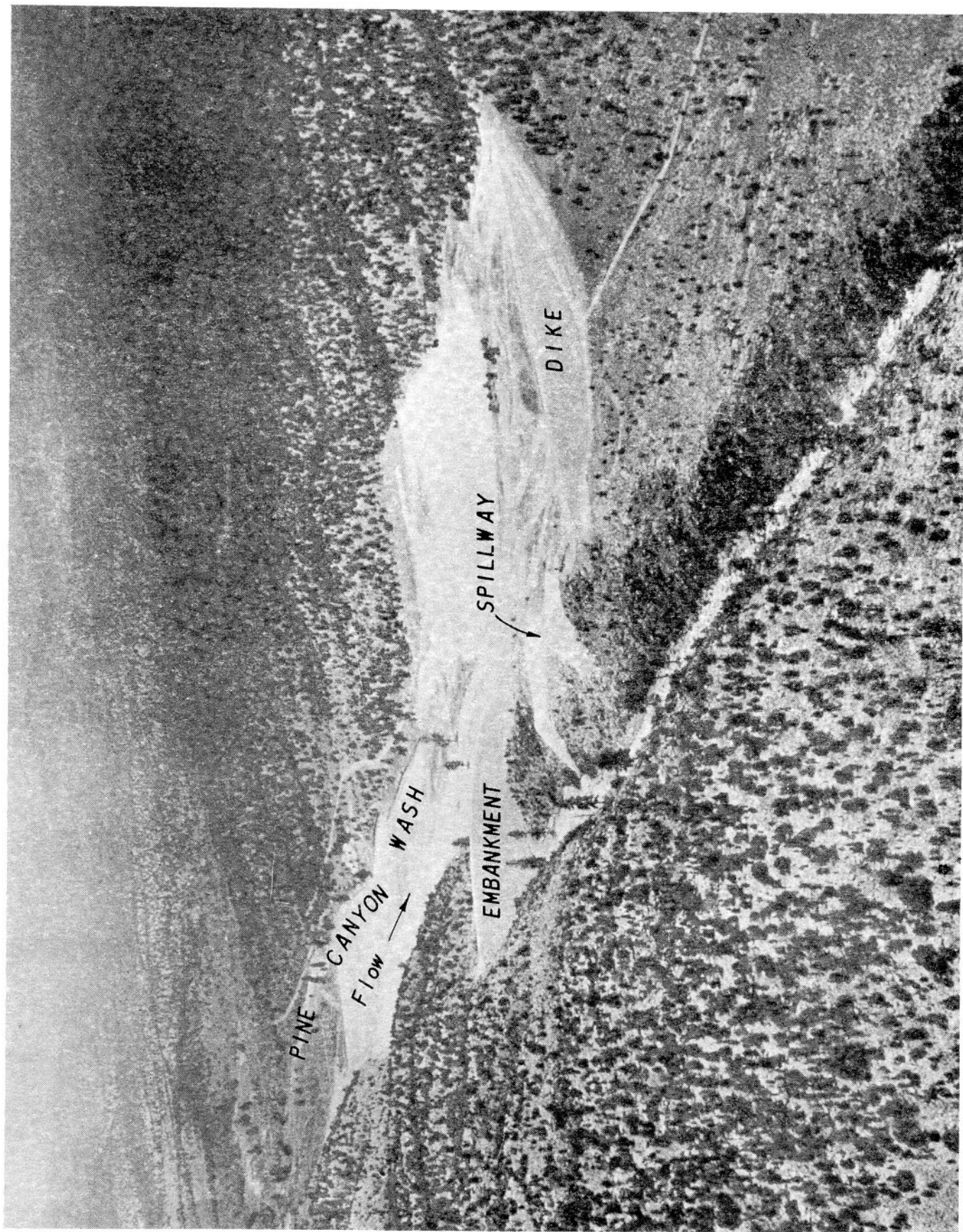
FOR

PINE CANYON DAM



U. S. ARMY ENGINEER DISTRICT, LOS ANGELES
CORPS OF ENGINEERS

OCTOBER 1974



PINE CANYON DAM

US ARMY ENGINEER DISTRICT, LOS ANGELES
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RESERVOIR REGULATION MANUAL

FOR

PINE CANYON DAM

VIRGIN RIVER & TRIBUTARIES, NEVADA, ARIZONA, & Utah
MEADOW VALLEY WASH & TRIBUTARIES, NEVADA

PERTINENT DATA

Drainage Area	sq. miles.	45
Reservoir:		
Elevation -		
Flood-control pool	ft., m.s.l.	5,675
Spillway design surcharge level	ft., m.s.l.	5,685.1
Area -		
Spillway crest	acres	254
Spillway design surcharge level	acres	322
Top of dam	acres	367
Capacity, gross -		
Allowance for sediment	ac.-ft.	1,400
Spillway crest	ac.-ft.	7,840
Spillway design surcharge level	ac.-ft.	10,725
Top of dam	ac.-ft.	12,460
Embankment:		
Type		Earthfill
Top elevation	ft., m.s.l.	5,690
Height above original streambed	ft.	92
Top length	ft.	884
Top width	ft.	20
Freeboard	ft.	4.9
Dike:		
Type		Earthfill
Top Elevation	ft., m.s.l.	5,690
Height above saddle	ft.	40
Top length	ft.	893
Freeboard	ft.	4.9
Spillway:		
Type		Crest-block
Crest length	ft.	330
Crest elevation	ft., m.s.l.	5,675
Design surcharge	ft.	10.1
Discharge at design surcharge	c.f.s.	31,700
Outlet Conduit:		
Invert elevation	ft., m.s.l.	5,604
Diameter	ft.	3.5
Length	ft.	479
Maximum capacity at spillway crest	c.f.s.	322
Outlet Channel (unlined):		
Length	ft.	150
Capacity	c.f.s.	340

PERTINENT DATA—Continued

Reservoir design flood:

Duration	hours	60
Total volume	ac.-ft.	7,300
Inflow peak	c.f.s.	10,500
Outflow peak	c.f.s.	321
Reduction in peak	c.f.s.	10,179

Spillway design flood: (Type "A")

Duration	hours	20
Total volume	ac.-ft.	15,800
Inflow peak	c.f.s.	38,000
Outflow peak	c.f.s.	31,700
Reduction in peak	c.f.s.	6,300