

September 18, 2012

Approved *Christopher Stone*
Christopher Stone

TO: Christopher Stone
FROM: Patricia Wood *P.W.*
Facilities Section
Water Resources Division

VALLEY FIRE BURNED AREA REPORT

The Valley Fire occurred in the City of Walnut on July 23, 2012, and burned a total of 15 acres, all of which are within the Los Angeles County Flood Control District. The burned area boundary is plotted on the attached burned area map.

Recommendations

1. Authorize us to send a copy of the burned area report to Flood Maintenance Division (FMD) as confirmation of the potential sediment impacts to storms drains and debris control facilities maintained by Public Works below the burned hillside. It is recommended that FMD monitor these facilities for postfire sediment impacts during storms and clean out these facilities in accordance with established criteria. The monitoring should continue for the next four to five years until the burned area has significantly recovered from the burn.
2. Authorize us to send copies of the burned area report to the Cities of Walnut and Industry apprising them of the potential impacts of the burn.

Vegetation Type Before Burn

Grassland

Fire History

The 17-acre Snowcreek Fire, which started on July 4, 1989, is the most significant fire to have occurred in the same area. The Valley Fire overlapped approximately 44 percent of the 1989 Snowcreek Fire burned area.

Summary of Potential Sediment Impact

On August 9, 2012, Water Resources Division staff conducted a field reconnaissance of the burned area to determine if residential homes or County-maintained facilities could potentially be impacted by flooding/debris flows during storms.

The 15-acre burned area is located in Debris Production Area 7. During moderate to severe storms, an estimated 830 cubic yards (cy) of total sediment (adjusted sediment production due to burn) may be produced from the 23-acre watershed, which is 66 percent burned.

Our field observations revealed that concrete swales and storm drain inlets located above Valley Boulevard may potentially be impacted by mud and debris flows during storms. The concrete swales were found to be filled with dried vegetation that may cause storm related mudflows to overflow the swale. The storm drain, drainage inlets, and concrete swales were all constructed under County Road Cash Contract No. 2113 and are maintained by FMD.

Subarea 1 has an area of 1.9 acres and is 40 percent burned creating an adjusted debris production potential of 60 cy. During moderate to severe storms, mudflow from this subarea is expected to flow into the concrete swale below the burned hillside. If the swales are not kept clear, subsequent sediment flows may overtop the swale and reach Valley Boulevard, causing flooding and sediment deposition on the roadway, impeding traffic.

Subarea 2 has an area of 2.7 acres and is 94 percent burned creating an adjusted debris production potential of 110 cy. During moderate to severe storms, mudflow from this subarea will flow directly into the concrete swale. If the swales are not kept clear, subsequent sediment flows may overtop the swale and reach Valley Boulevard, causing flooding and sediment deposition on the roadway, impeding traffic.

Subarea 3 has an area of 9.2 acres and is 78 percent burned creating an adjusted debris production potential of 360 cy. During moderate to severe storms, mudflow from this subarea is expected to flow into the concrete swale and storm drain inlets below the burned hillside. If the swales are not kept clear, subsequent sediment flows may overtop the swale and reach Valley Boulevard, causing flooding and sediment deposition on the roadway, impeding traffic.

Subarea 4 has an area of 9.1 acres and is 48 percent burned creating an adjusted debris production potential of 300 cy. During moderate to severe storms, mudflow from this subarea is expected to flow into the concrete swale and storm drain inlet below the burned hillside. If the swales are not kept clear, subsequent sediment flows may overtop the swale and reach Valley Boulevard, causing flooding and sediment deposition on the roadway, impeding traffic.

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There are no residents that could be impacted by storm produced debris flows. No homes are present in the immediate vicinity downstream of the burned hillside.

If you have any questions regarding this report, please contact Kenneth Rickard at Extension 6154.

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HR
RP

HR:vt

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Attach.

cc: Flood Maintenance (Longden Yard)