



On-Roof Infrared Thermographic Survey of Roof Moisture

Widget Company
Your Town, USA

Prepared for:
Mr. Bill Manager



Thermal Imaging Partners, Inc.
16192 Coastal Highway
Lewes, DE 19958
844-TIP-SCAN

March 1, 2016

Bill Manager
United Widget
100 Central Avenue
Your Town, USA

**Re: On-Roof Infrared Survey of Roof Moisture
United Widget in Your Town, USA**

Dear Mr. Manager:

Herein, please find the report for the on-roof moisture survey that was conducted on the evening of March 1, 2016. Thermal and visual images of all suspect moisture areas can be found on the Thermographic Report pages. These areas are shown on the roof map on the following page, which correlate to the report page numbers.

Analysis and Recommendations

The roof is a modified bitumen in fair-good condition with respect to entrained moisture in the roof substrate. We marked seven (7) areas of suspected subsurface moisture contamination directly on the roof surface with marking paint. These areas should be tested to confirm our analysis. There were several locations where there are air pockets, but they are all dry. Report 'A' shows an area of heat blowing down onto the roof surface, which should be tested. Finally, we recommend checking the flashing and pipe connections at roof drain on the West roof section for a mechanical leak. Maintenance personnel at the site report a persistent leak in the conference room below, but we found no indication of entrained moisture in that section.

Please let me know if I can be of any assistance by calling me directly at 844-TIP-SCAN. We are looking forward to working with your company on many future projects.

Sincerely,

Rob Miller, CIT
Level III Certified Thermographer
Rob@ThermalImagingPartners.com

Attachment A – Google Earth Image Roof

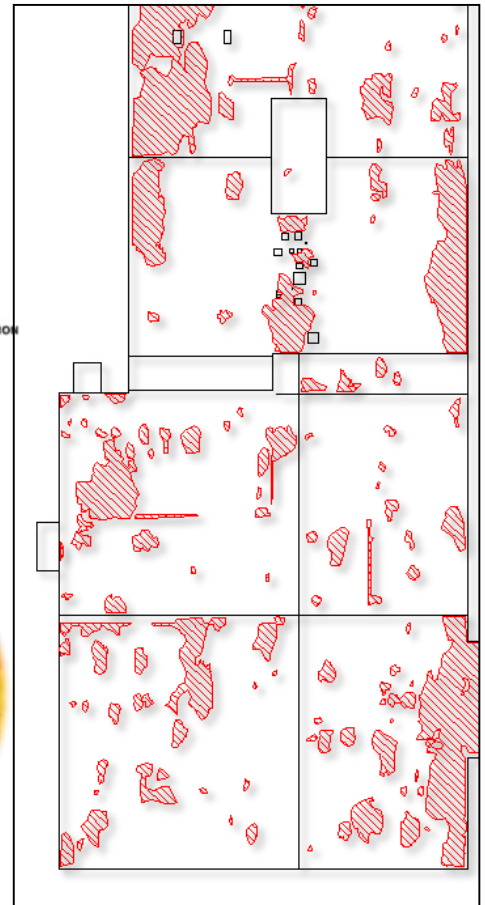
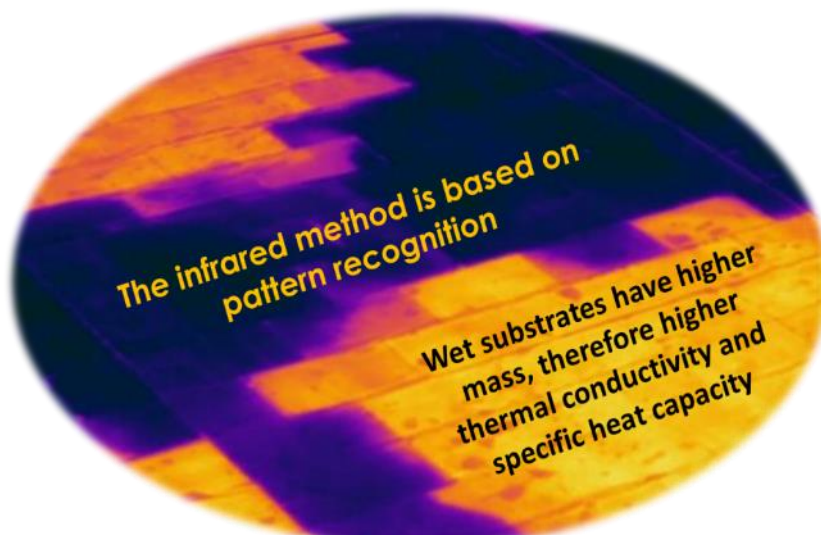
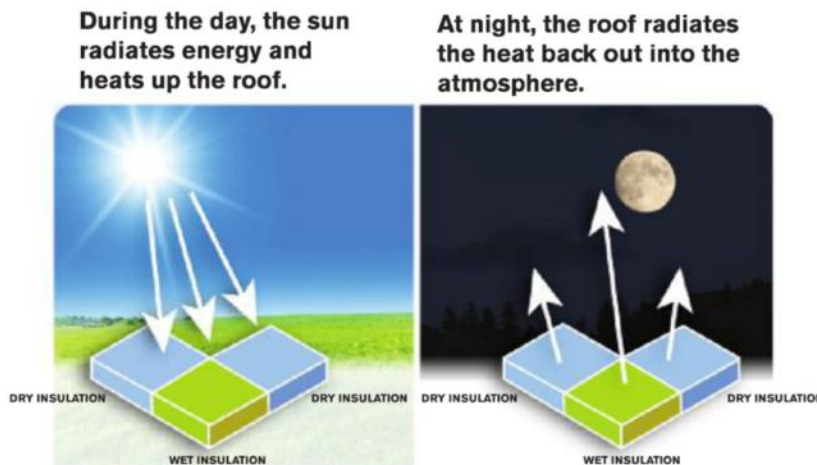


Flat and Low-Sloped Roofing System

Understanding Infrared Roof Imagery

Areas of roof moisture contamination often manifest themselves as warmer (lighter colored) areas that may be nebulous in shape and sometimes mottled in appearance, although they are commonly found in linear or puddle-like shapes. The linear shapes many times follow low areas, drainage routes, roof edges and seams. Puddle-like round or oblong shapes often form around roof penetrations such as mechanical equipment, standpipes, vents and drains.

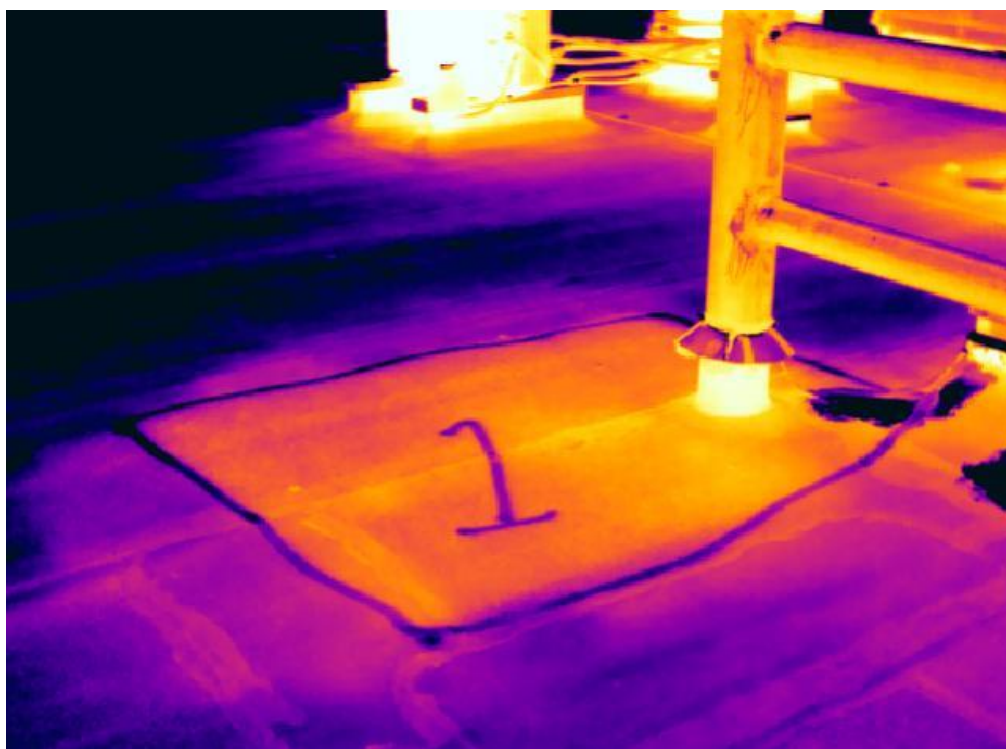
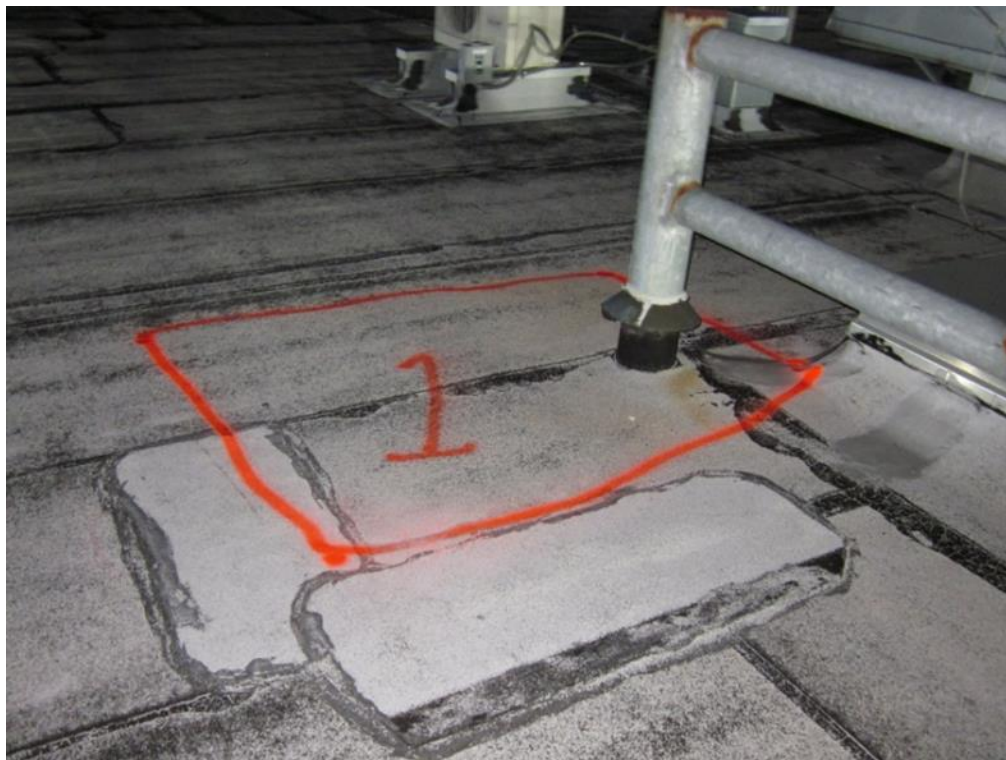
The wet areas are lighter in color because the latent heat (from daylight sunshine) in the trapped water mass is greater than in the dry, functioning insulation or roof substrate. After sunset when the roof structure cools down, wet areas of roof insulation and other materials continue to radiate heat, allowing our sensitive infrared cameras to detect the sources of heat and record them for later analysis.



Thermographic Report # 1

On-Roof Survey of March 1, 2018

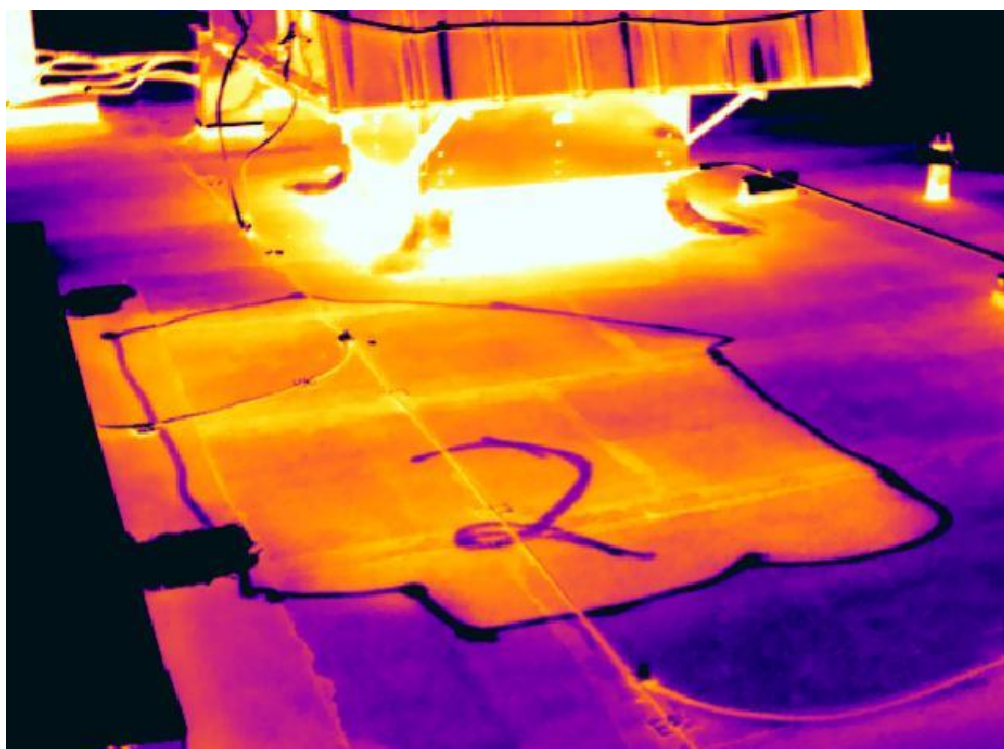
Notes: Areas of suspect subsurface moisture are marked directly on the roof.



Thermographic Report # 2

On-Roof Survey of March 1, 2018

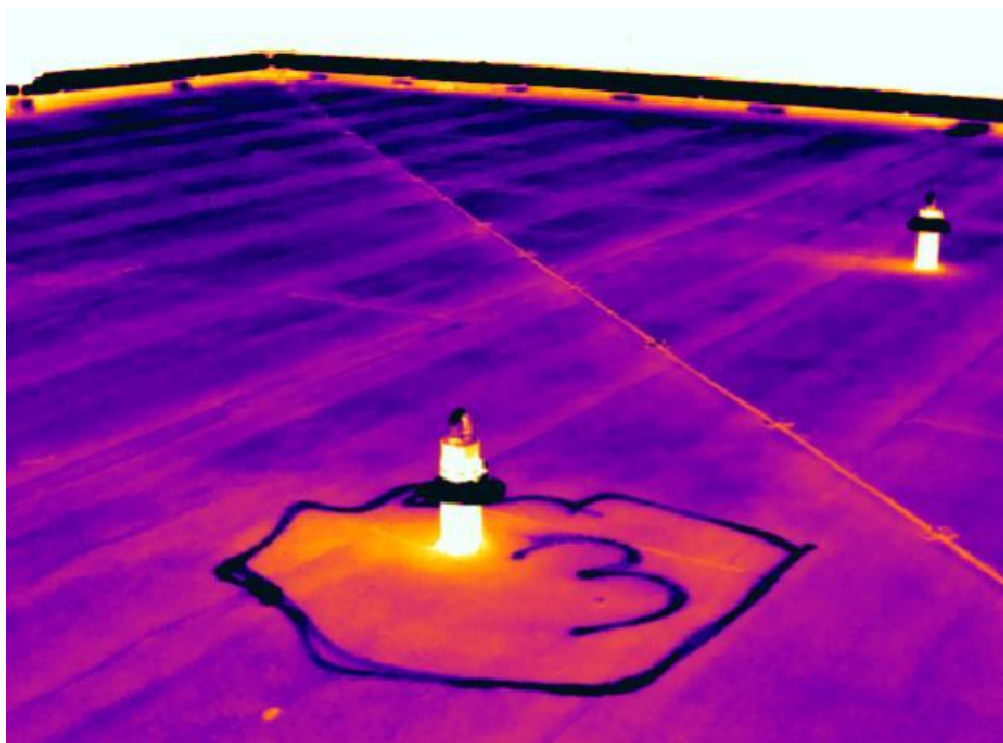
Notes: Areas of suspect subsurface moisture are marked directly on the roof.



Thermographic Report # 3

On-Roof Survey of March 1, 2018

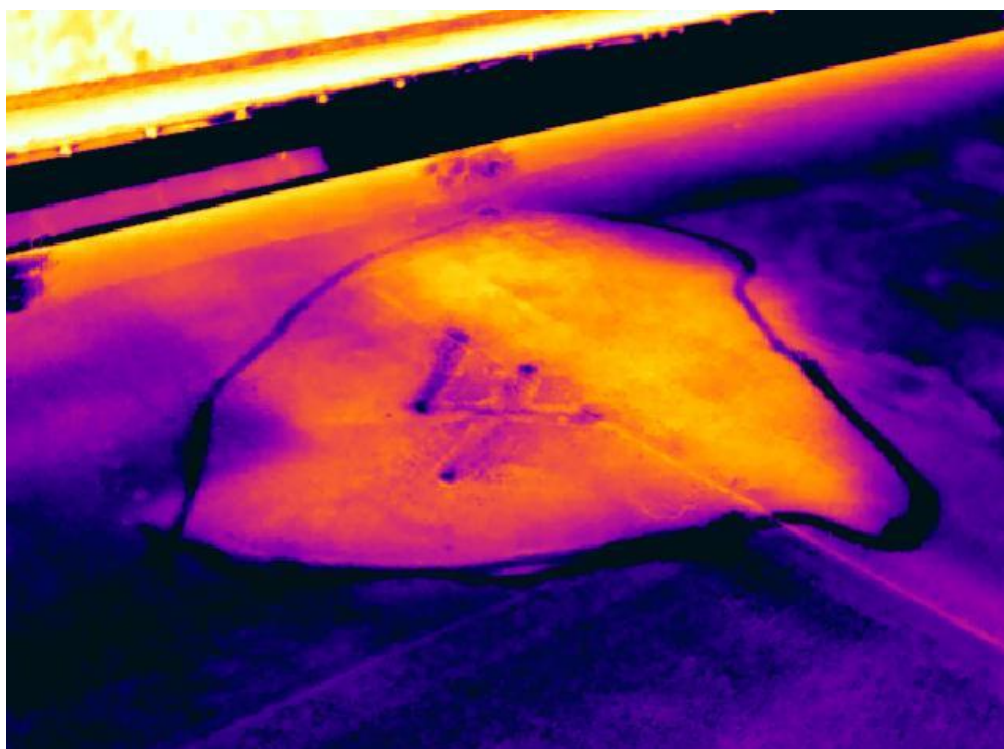
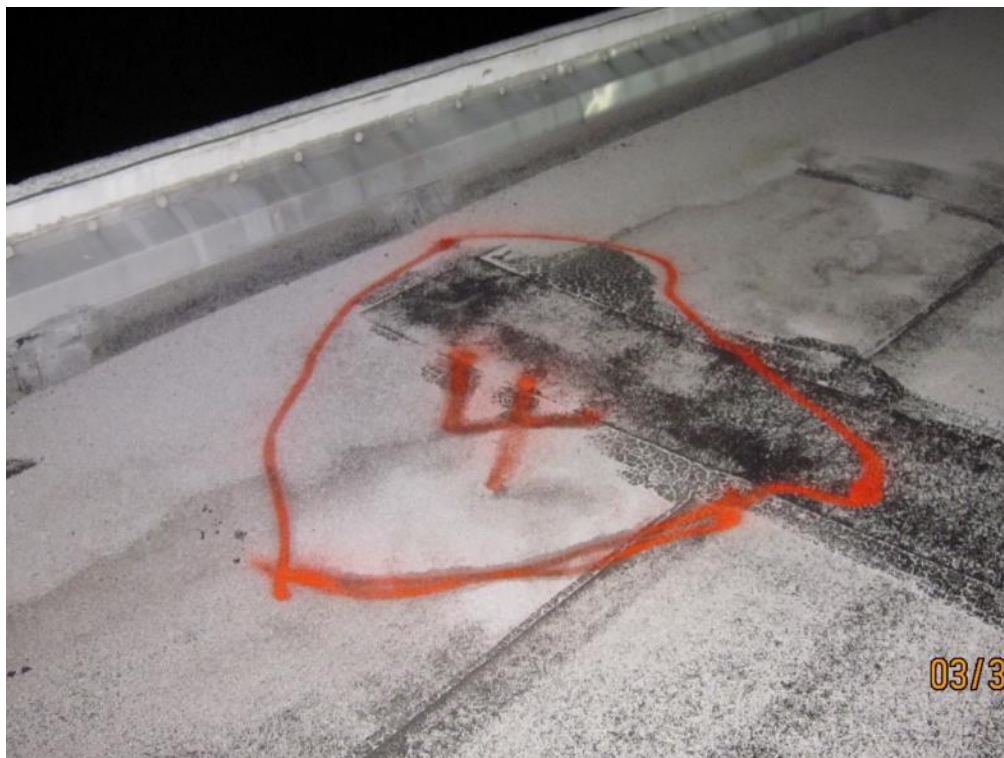
Notes: Areas of suspect subsurface moisture are marked directly on the roof.



Thermographic Report # 4

On-Roof Survey of March 1, 2018

Notes: Areas of suspect subsurface moisture are marked directly on the roof.



Thermographic Report # 5

On-Roof Survey of March 1, 2018

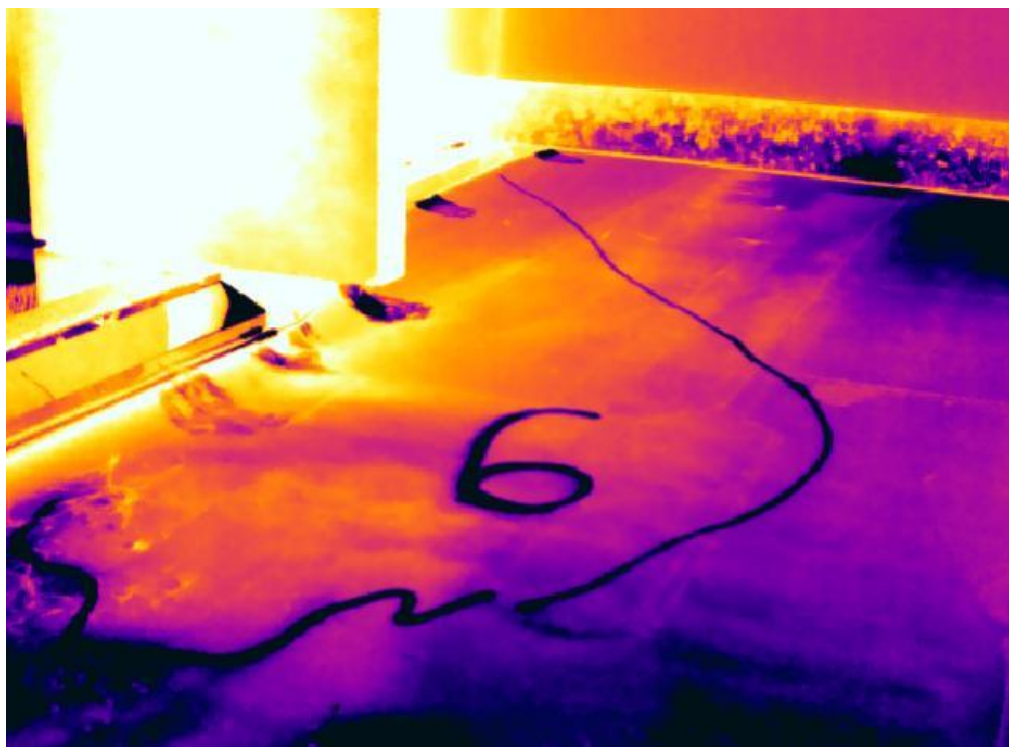
Notes: Areas of suspect subsurface moisture are marked directly on the roof.



Thermographic Report # 6

On-Roof Survey of March 1, 2018

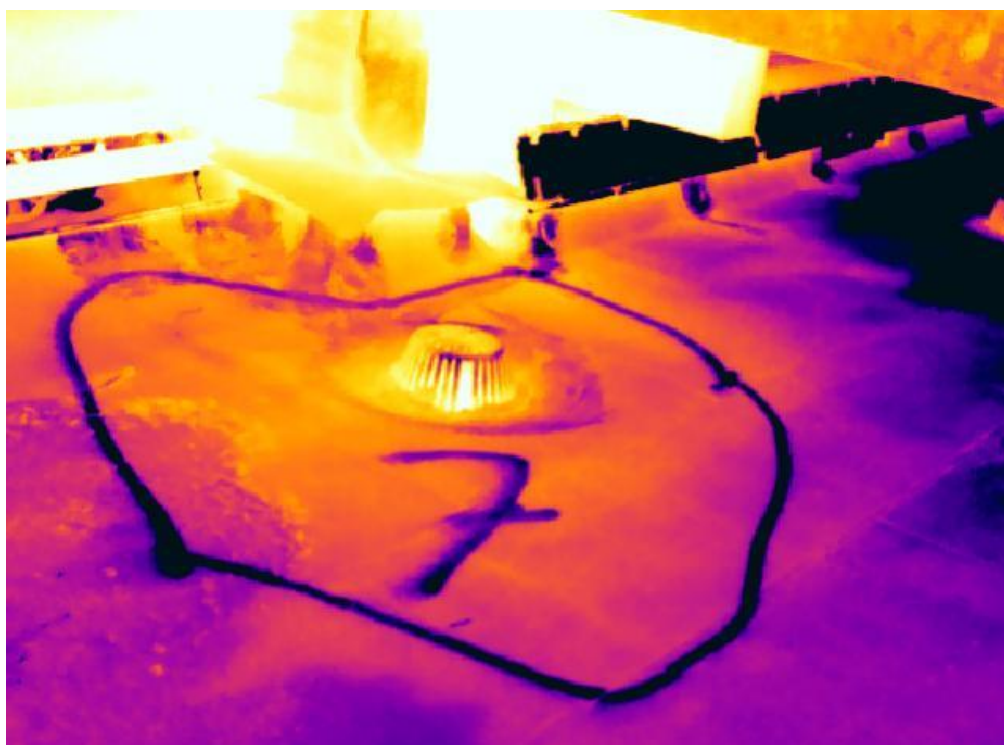
Notes: Areas of suspect subsurface moisture are marked directly on the roof.



Thermographic Report # 7

On-Roof Survey of March 1, 2018

Notes: Areas of suspect subsurface moisture are marked directly on the roof.



Thermographic Report # A

On-Roof Survey of March 1, 2018

Notes: Check area, as heat from the fan masked the IR imagery.

Heat from the fan
blowing hot air on
the roof as indicated.

