

Address:	[REDACTED]
Inspection Date:	September 14, 2021
Company:	O'Neil Consulting
Contact:	[REDACTED]
Certified Thermographer:	Matt O'Neil
Valid Certification Number:	CDN-2020314
Infrared Camera Used:	Mavic 2 Enterprise Dual/FlirOne Pro
Date of last calibration:	June 01 2021
Weather	10 Celsius, clear calm, wind at 15kph

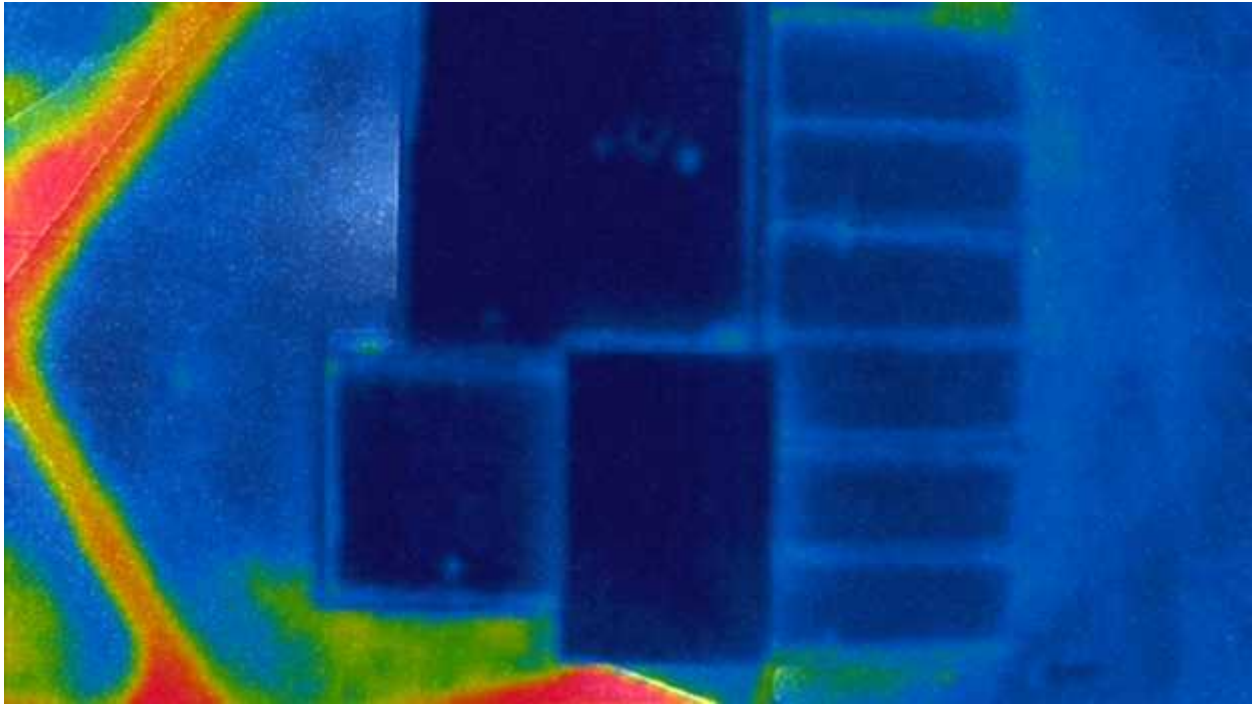


Inspection

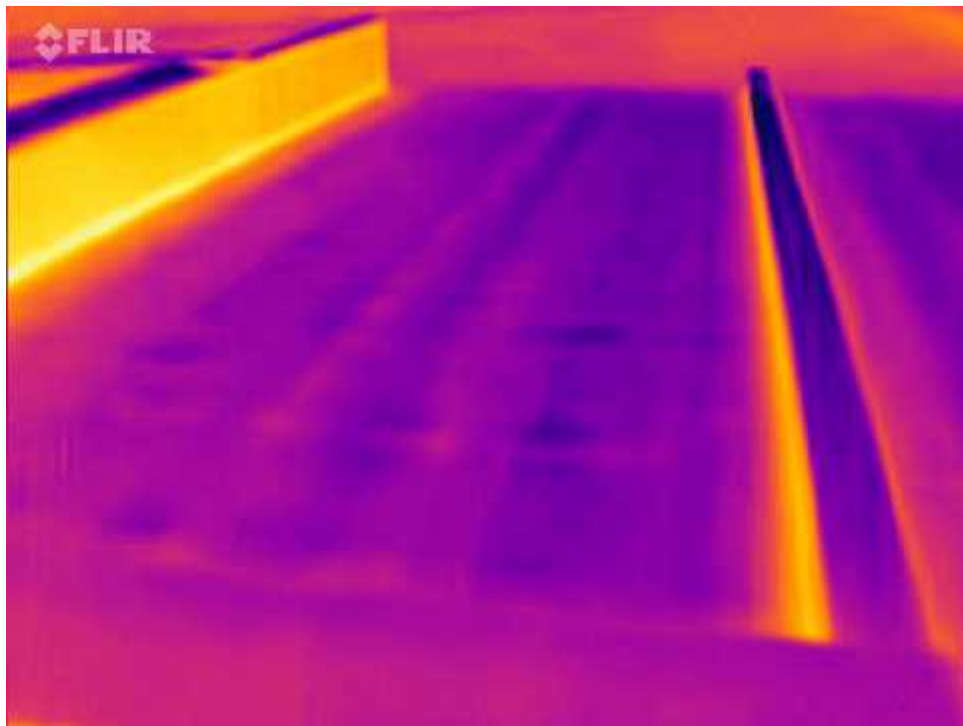
This Infrared Thermography Inspection report provides complete documentation of the thermal patterns detected in your equipment, structures or systems. We use an objective evaluation to help you prioritize repairs to provide the maximum return for this Inspection and its Maintenance Program based on IR Thermography.



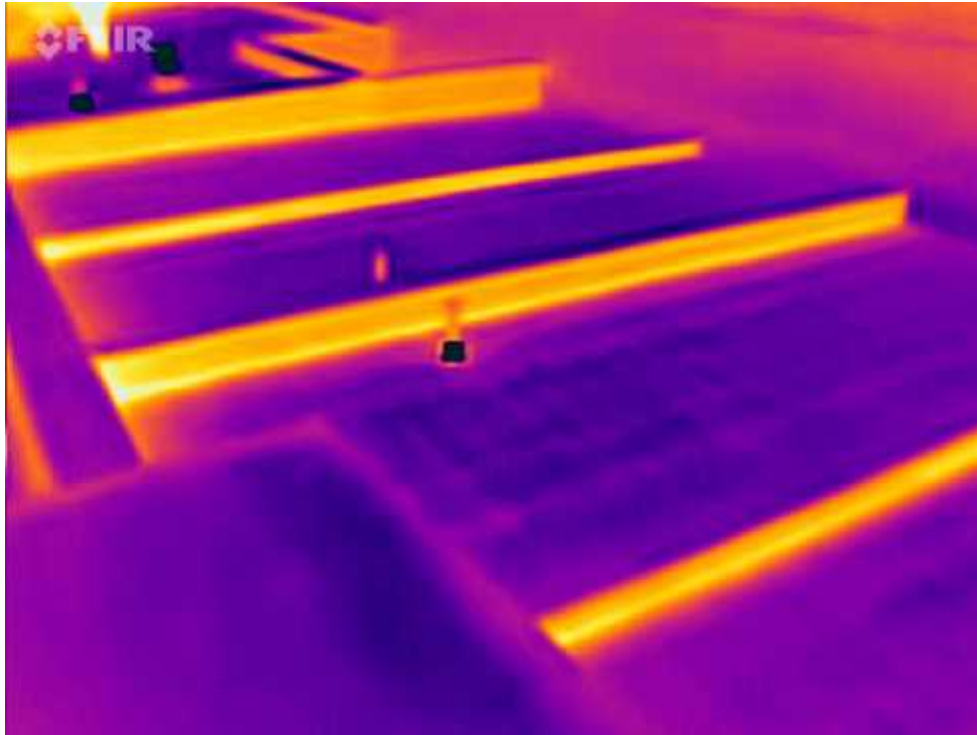
On the night of September 14, 2021, O'Neil Consulting conducted a thermal review of [REDACTED] school at the request of [REDACTED]. Above shows a complete overview of the roof outlining the sections scanned in the thermal review. Suspected wet areas have been circled in red on the above picture.



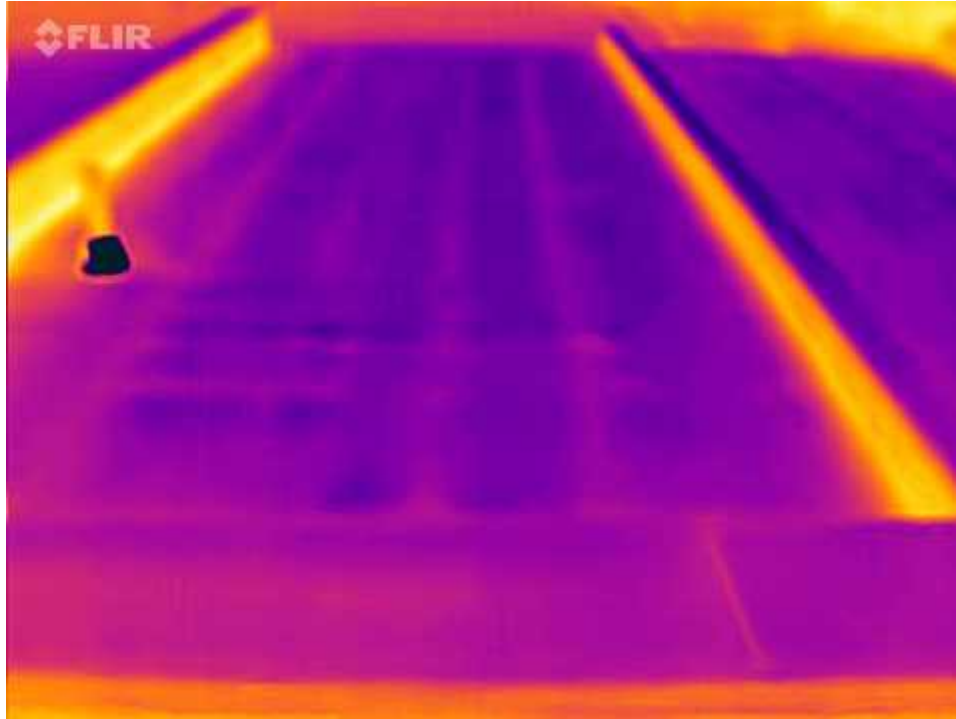
Starting on the south portion of the school, areas K, L and M show no signs of water infiltration into the system, and no ponding water.



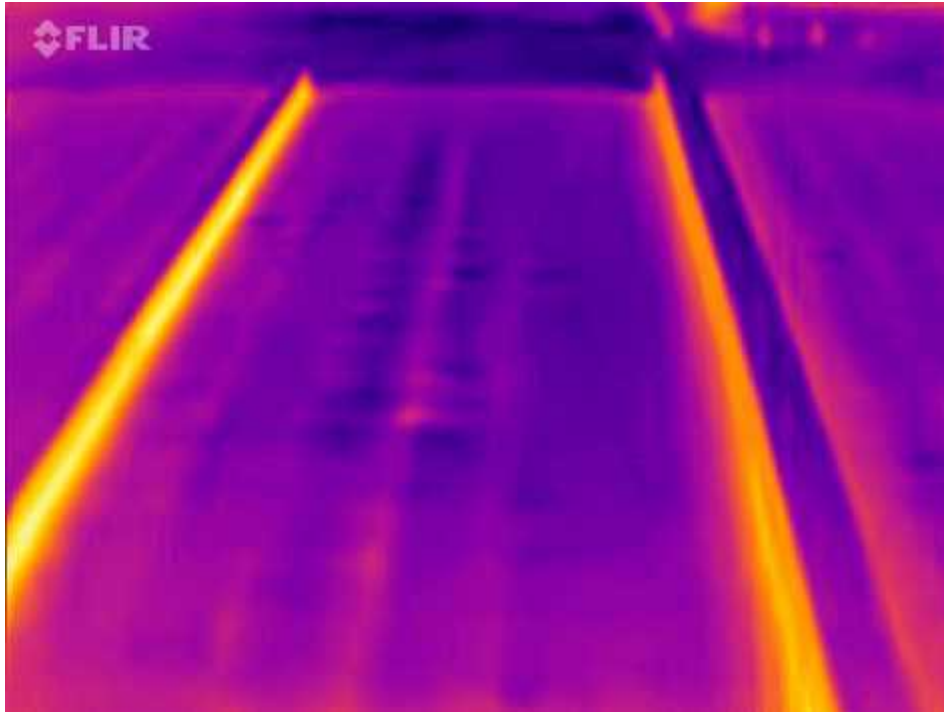
Flir One Photo taken in section M looking at the first portable to the north. No anomalies found.



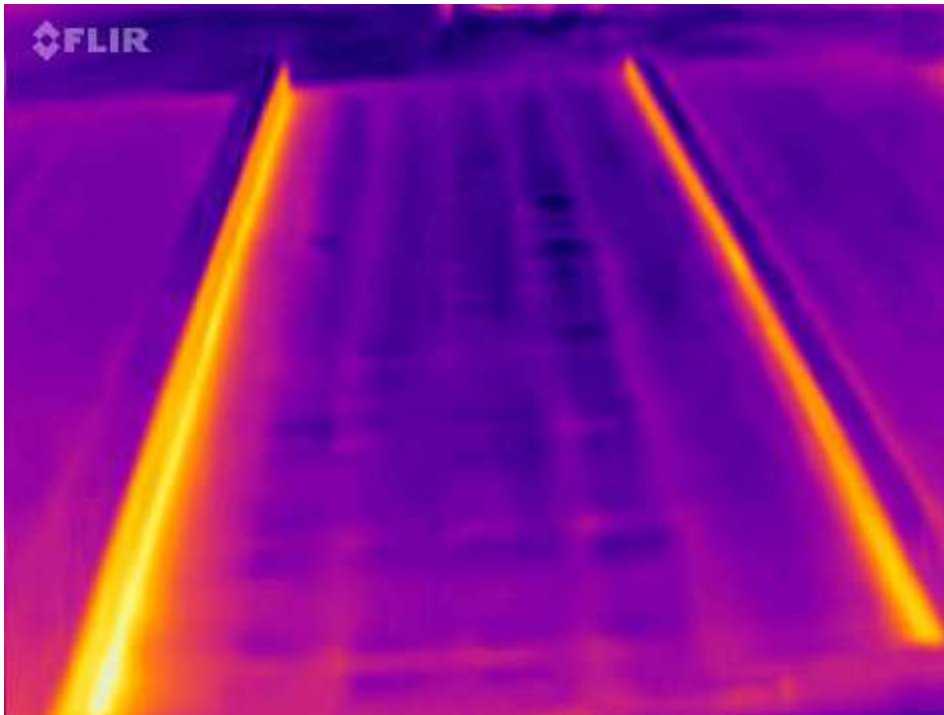
Flir One Photo taken in section M looking at the second portable to the north. No anomalies found.



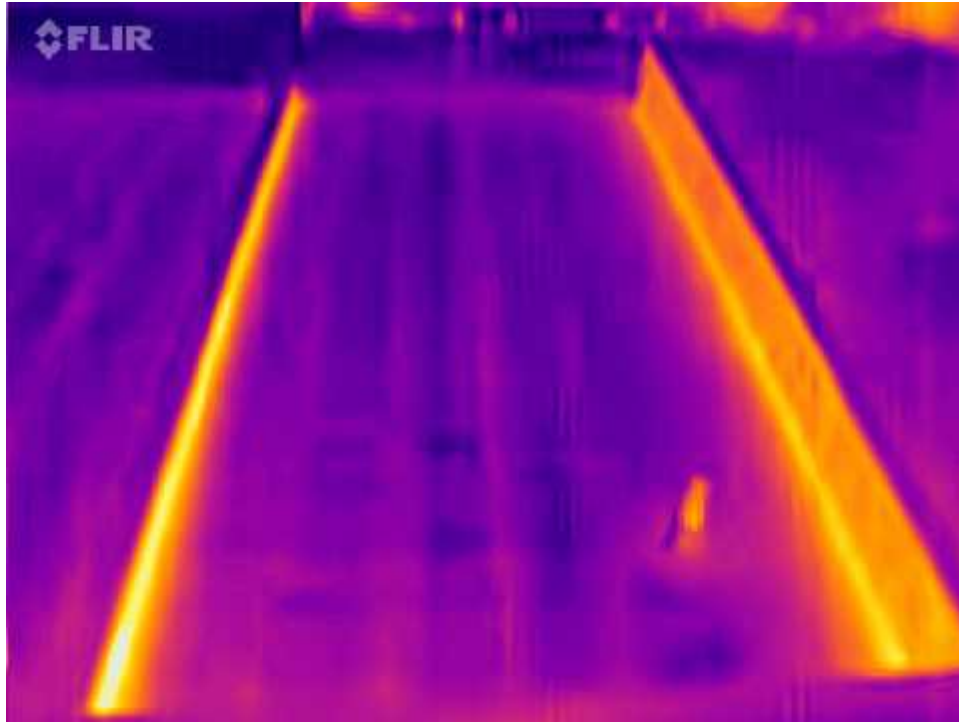
Flir One Photo taken in section M looking at the third portable to the north. No anomalies found.



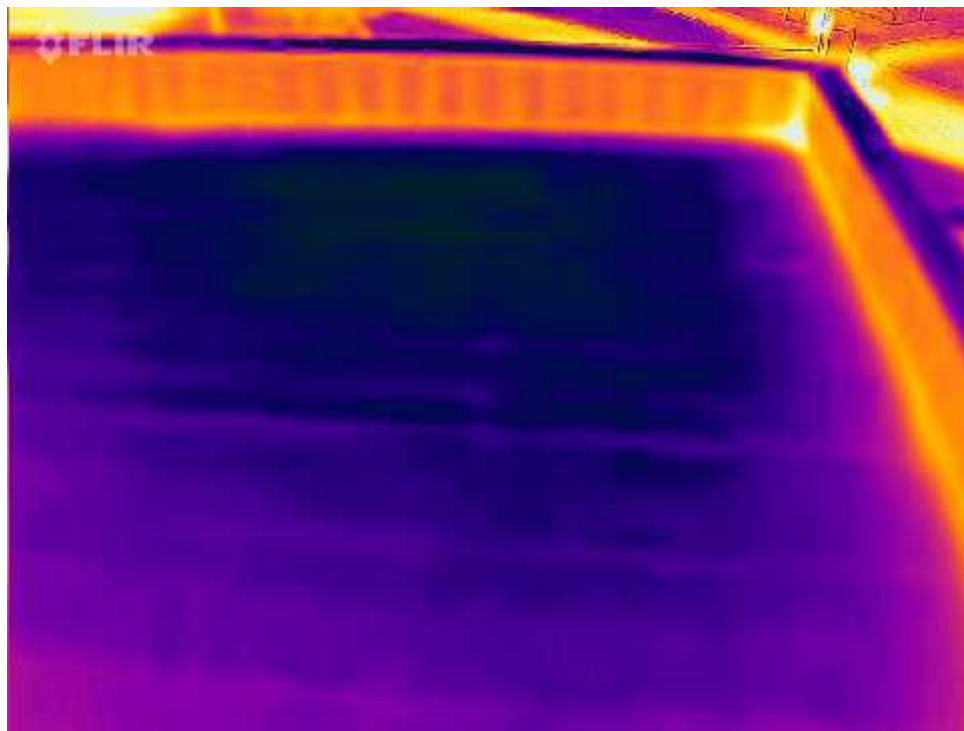
Flir One Photo taken in section M looking at the fourth portable to the north. No anomalies found.



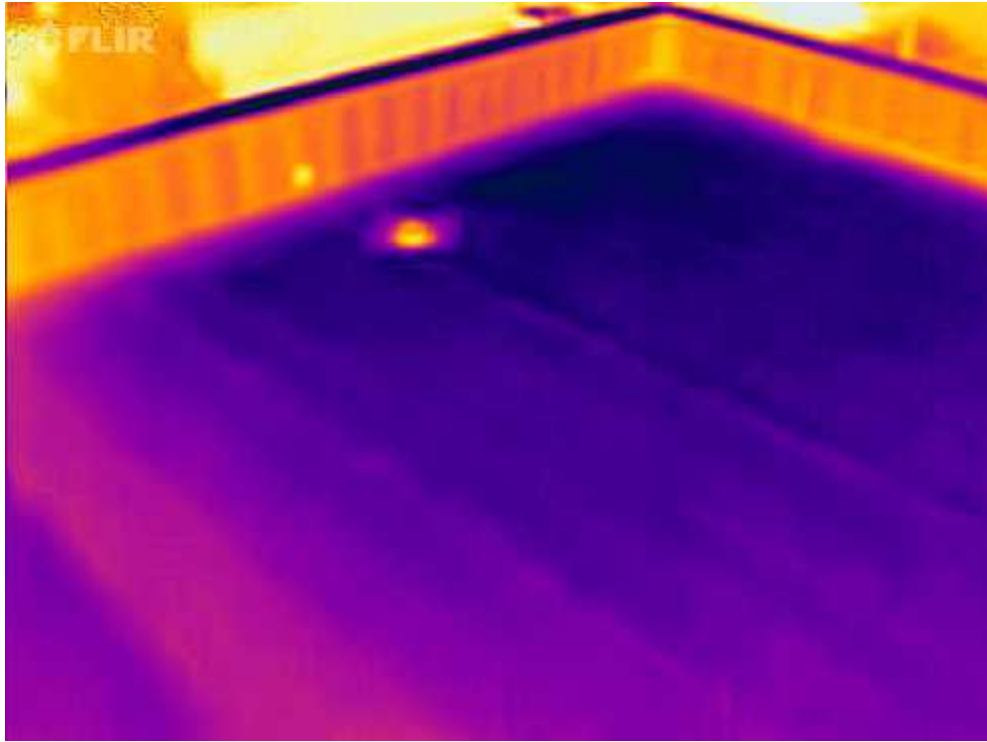
Flir One Photo taken in section M looking at the fifth portable to the north. No anomalies found.



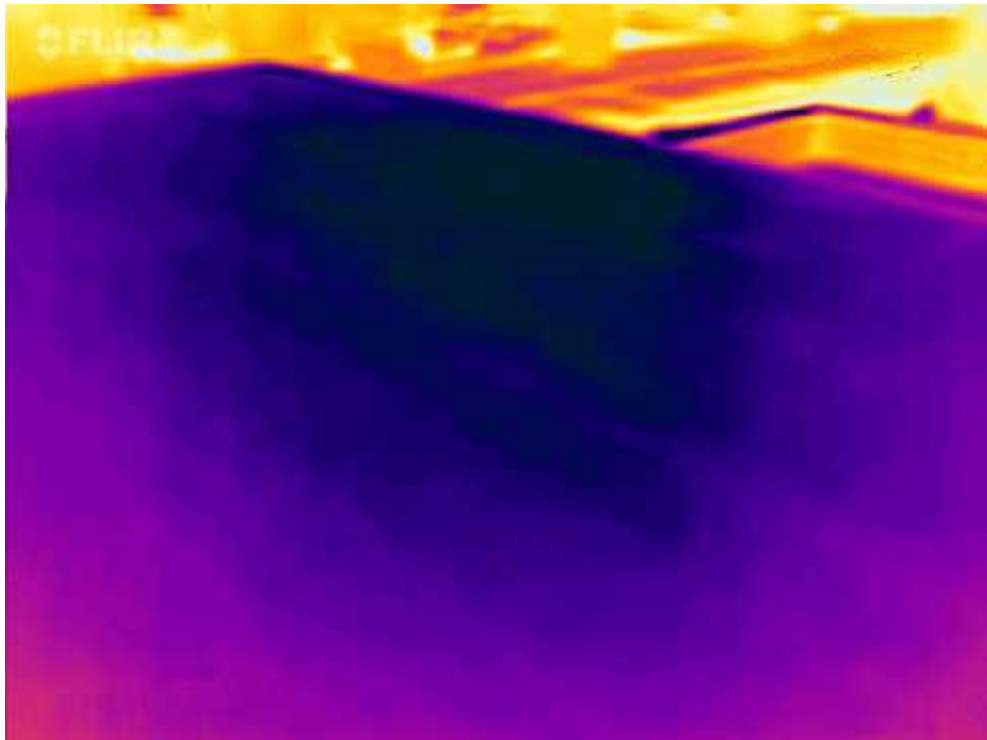
Flir One Photo taken in section M looking at the last portable. No anomalies found.



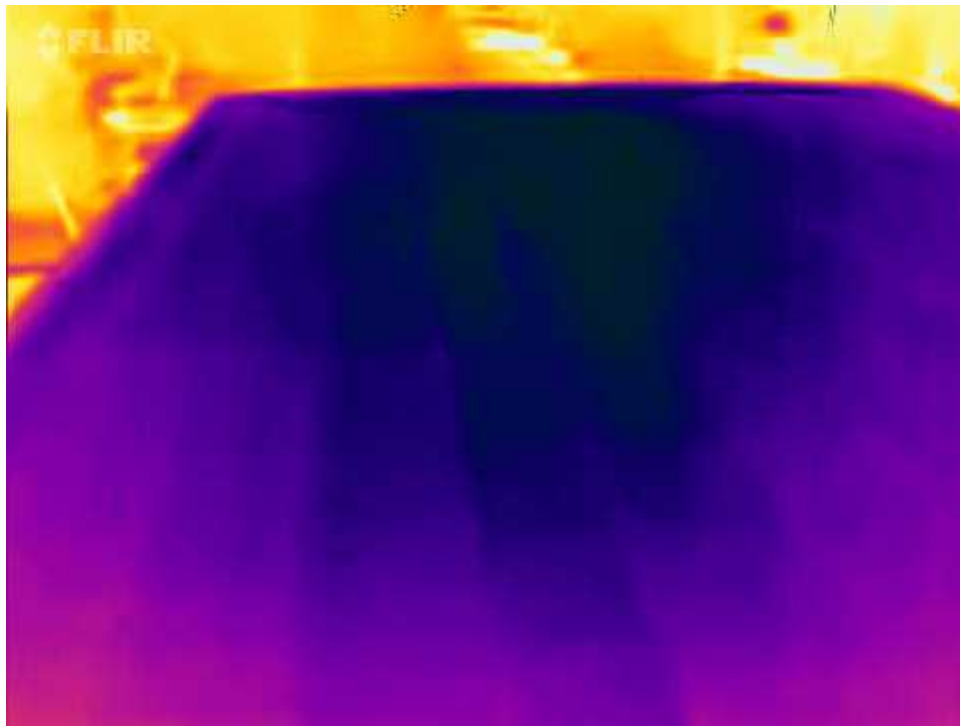
Flir One Photo looking over section K, no anomalies detected.



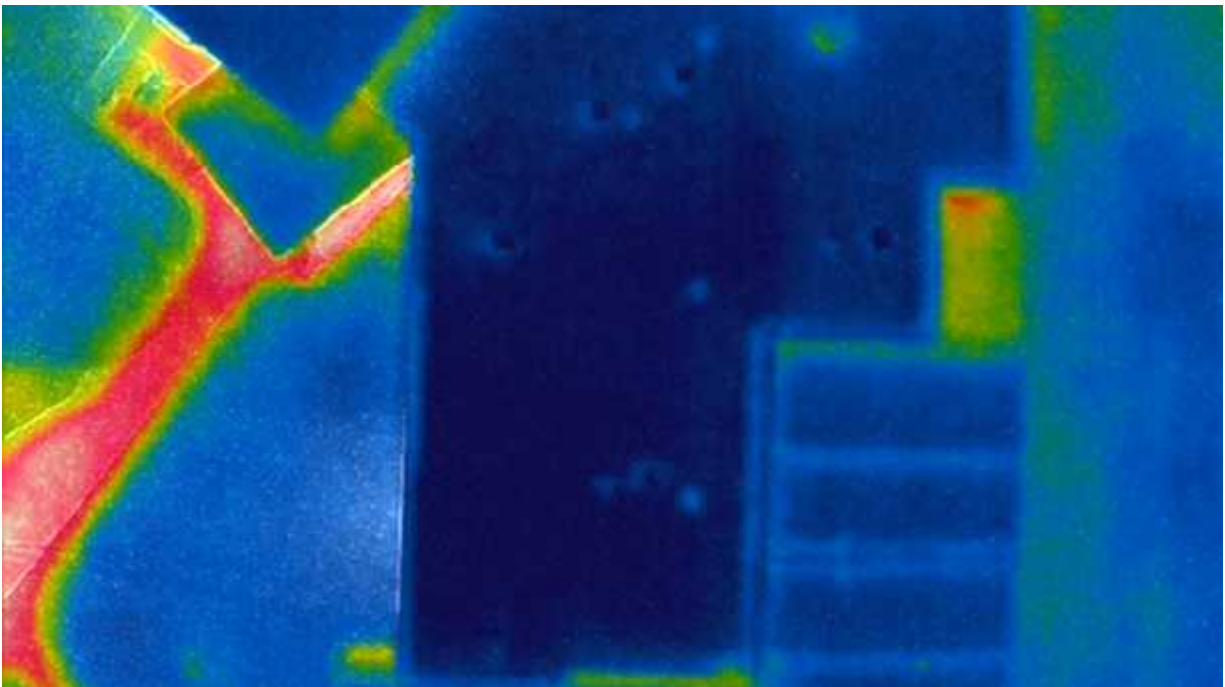
Flir One Photo looking over section K, no anomalies detected.



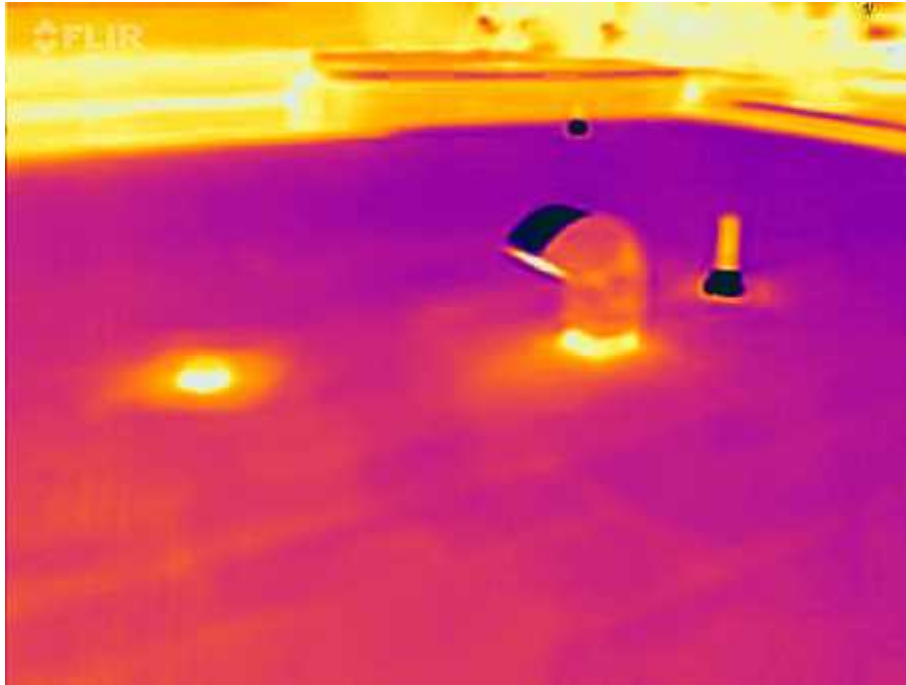
Flir One Photo looking over section L, no anomalies detected.



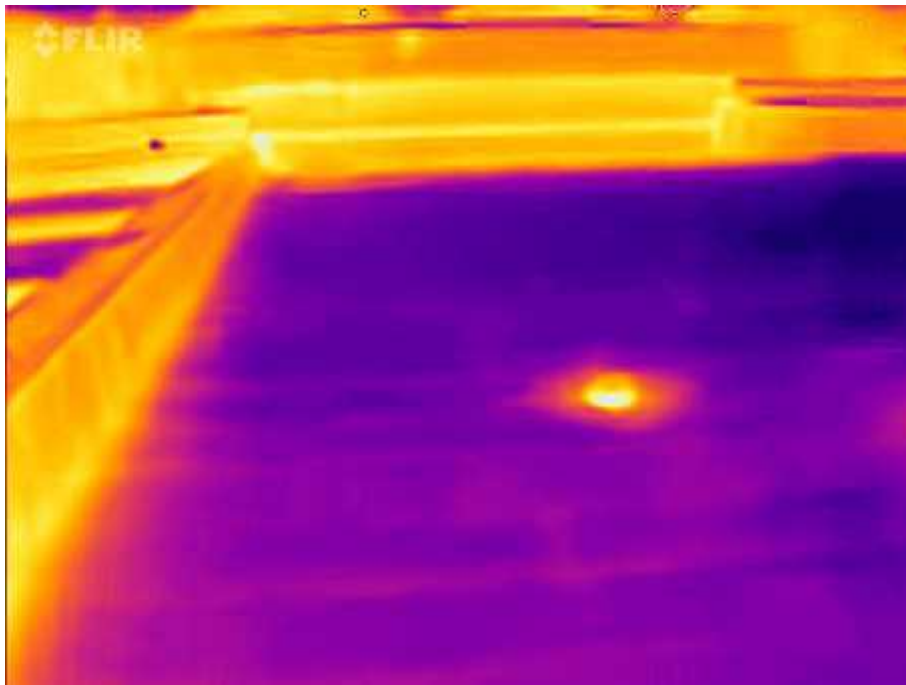
Flir One Photo looking over section L, no anomalies detected.



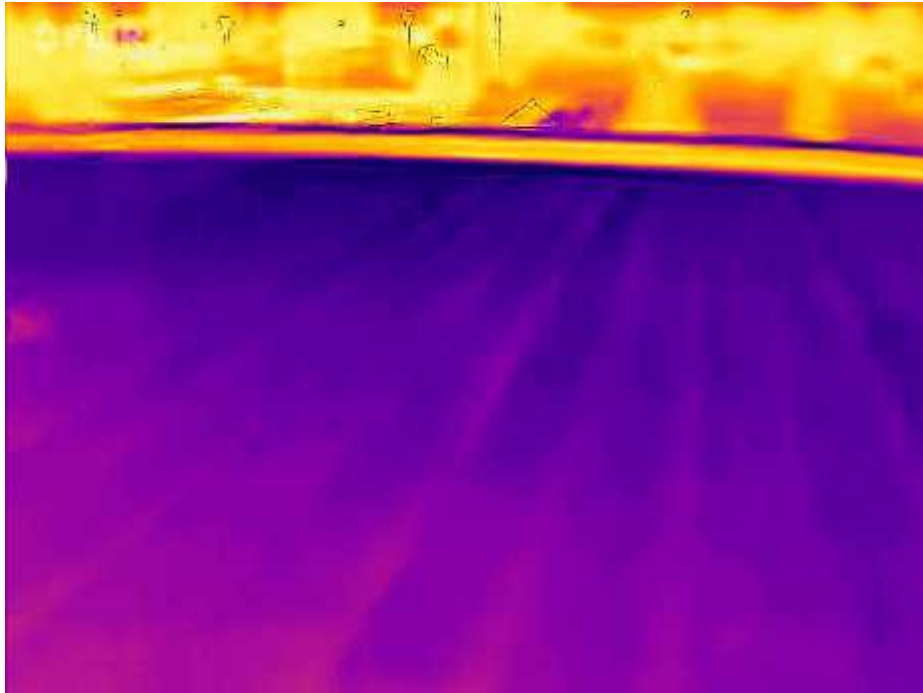
Moving to the north, section J depicted above has no anomalies to report, and no suspicion of water infiltrating the roofing system.



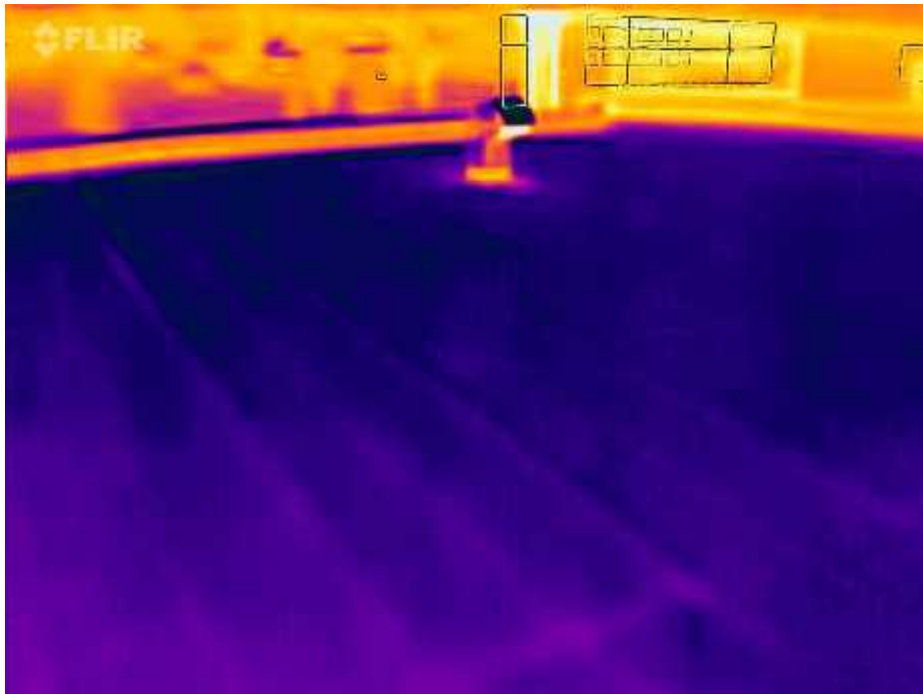
Flir One Photo looking over section J, picture taken looking south towards sections M and L, vent curb looks to have no insulation.



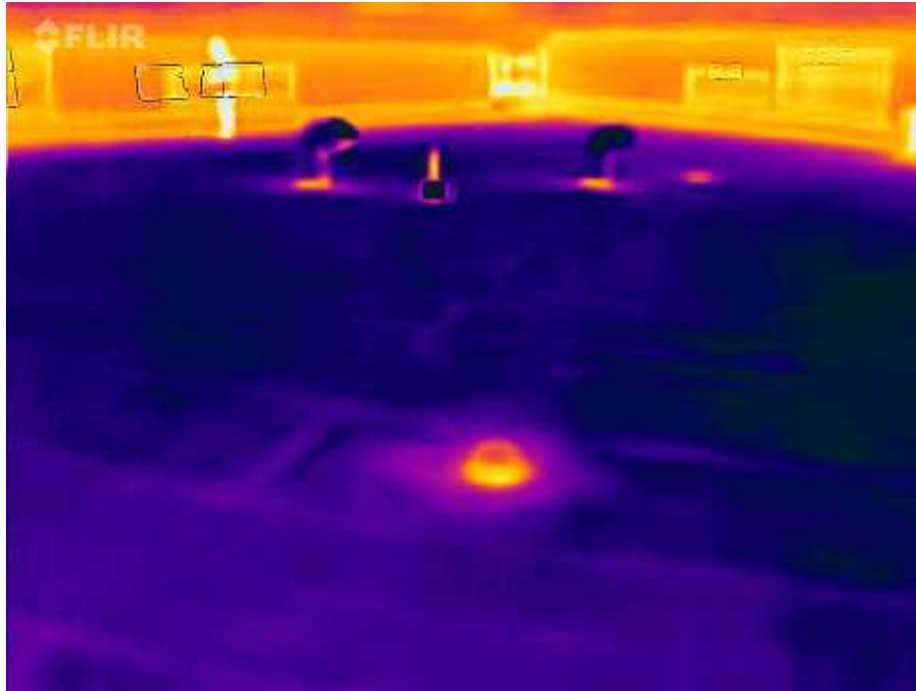
Flir One Photo looking south over section J, no anomalies detected.



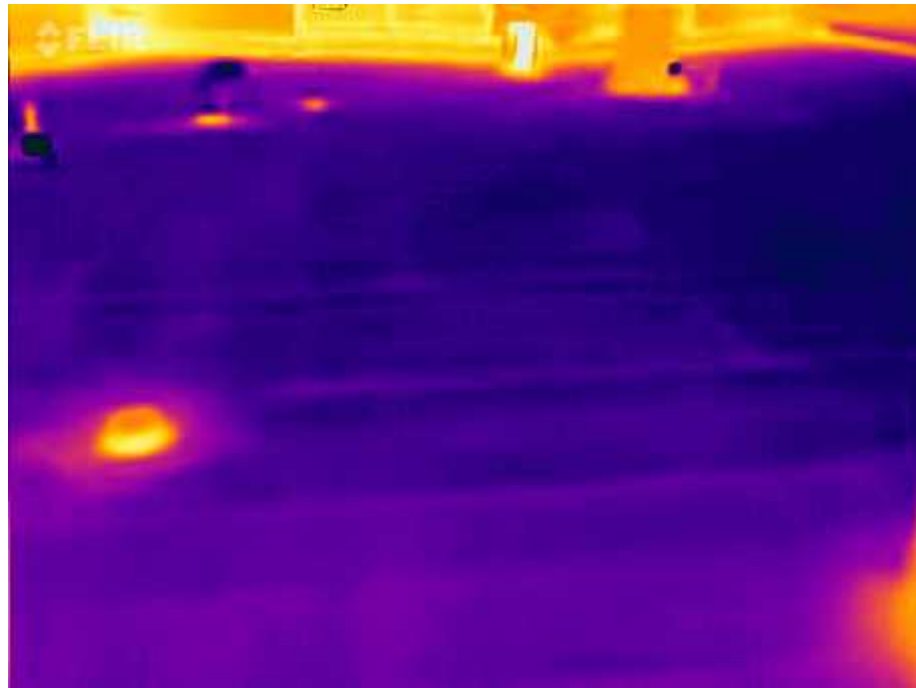
Flir One Photo looking west over section J, no anomalies detected.



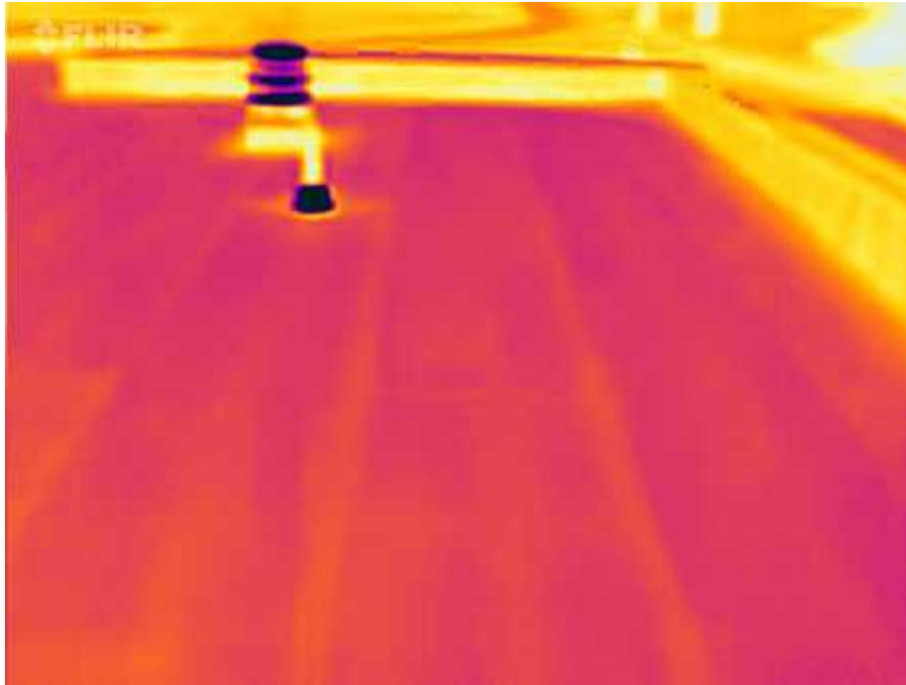
Flir One Photo looking northwest on section L, no anomalies detected.



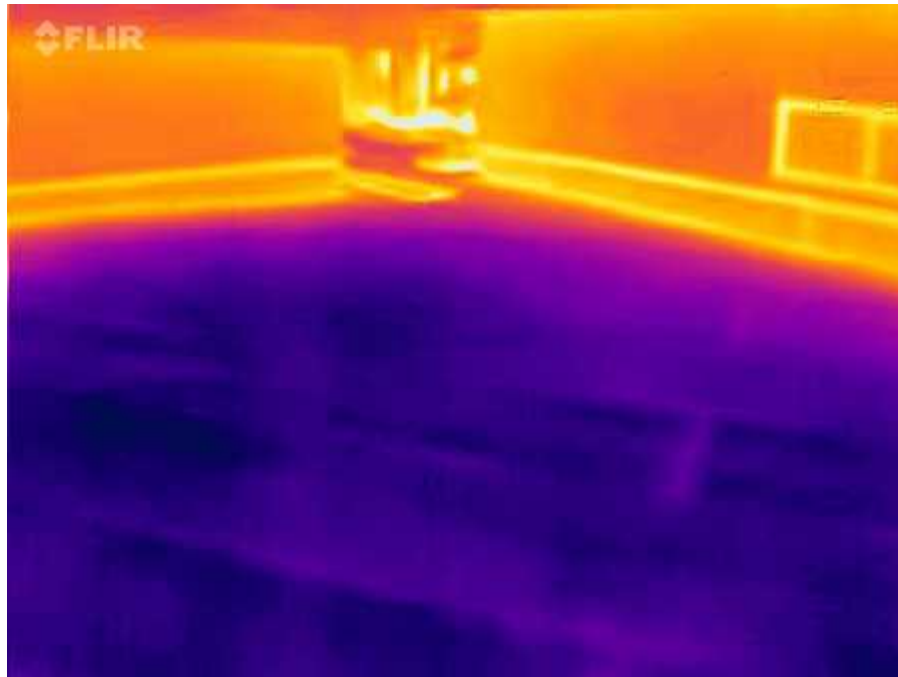
Flir One Photo looking north on section J, no anomalies detected.



Flir One Photo looking north on section J, no anomalies detected.



Flir One Photo looking east on section J, no anomalies detected.



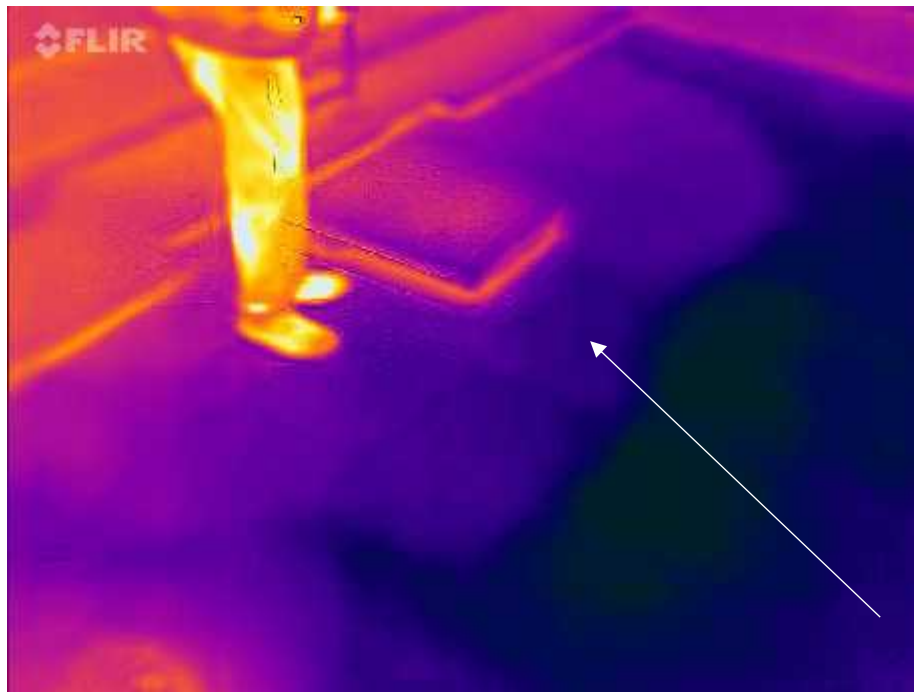
Flir One Photo looking north on section J into the corridor with the main roof top unit, no anomalies detected.



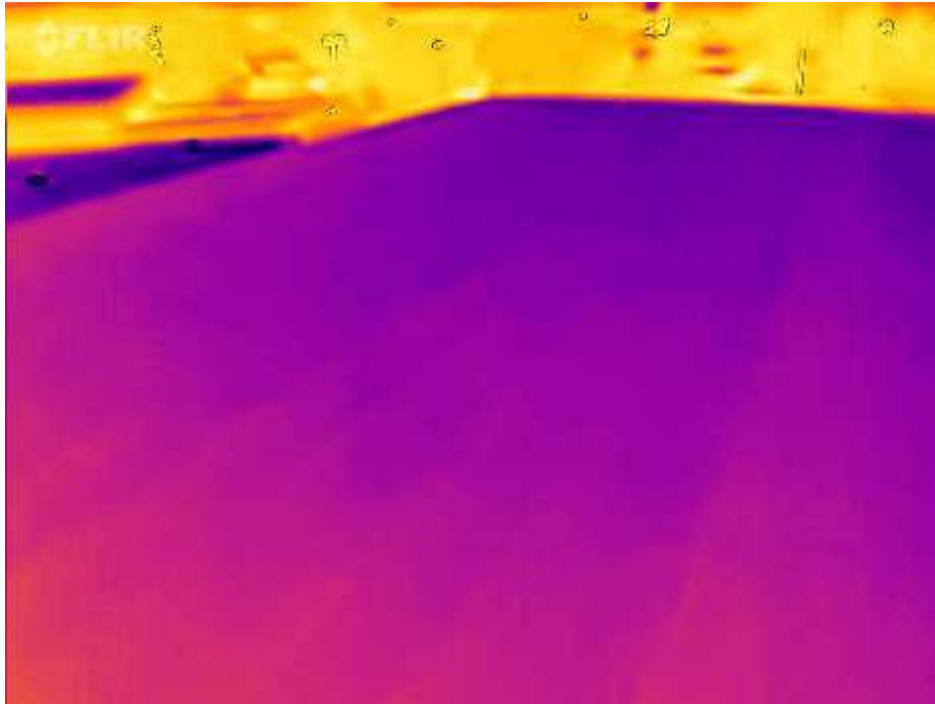
Moving north above shows areas G, H, I and the north section of J. Both sections I and G have no evidence that moisture has infiltrated the system, but in section H at the bottom of the ladder leading up to section G we have found evidence of water getting into the stripping surrounding the ladder and immersing itself into the system (area circled in white).



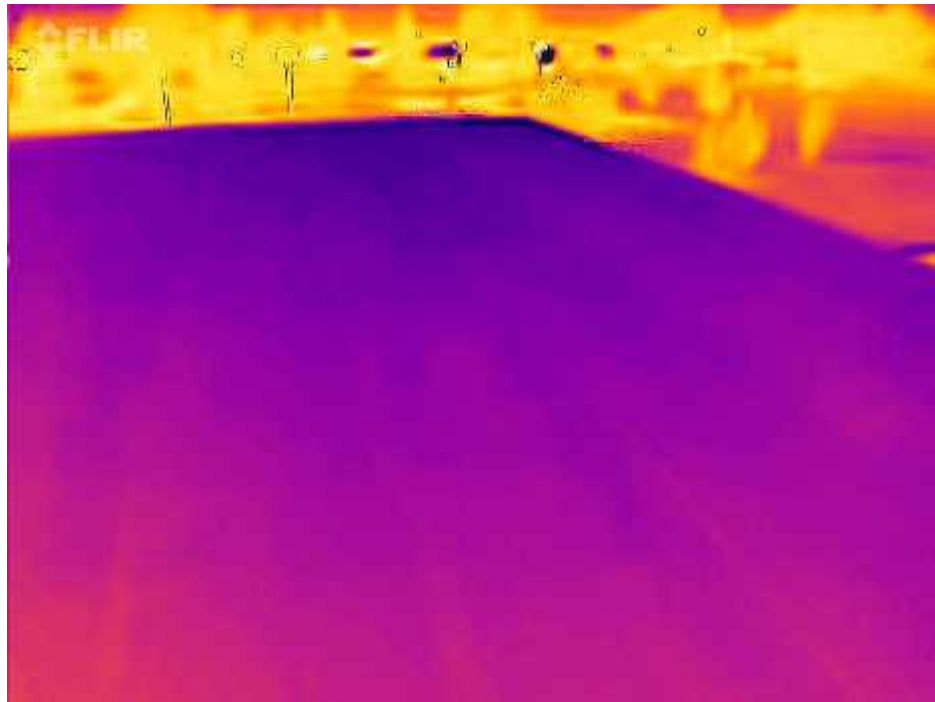
Flir One Photo looking north inside section H, due to the in closed space and the heat from the RTU thermal imaging was relatively difficult but one area was found to be suspected wet.



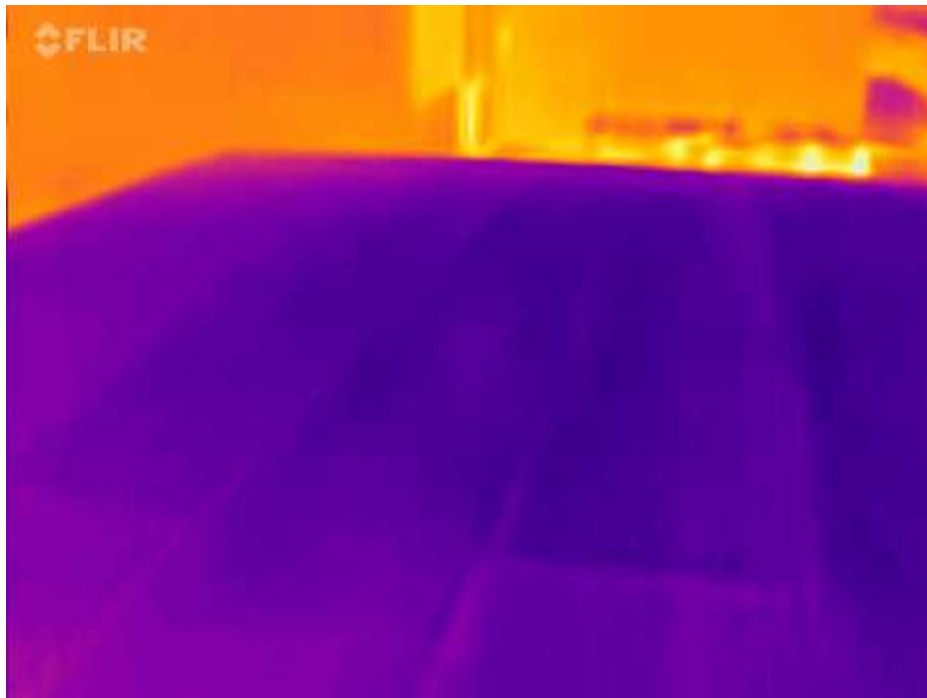
Flir One Photo suspected wet area at the bottom of the ladder leading to section G. water is suspected to be getting in where stripping is run up tying to seal the ladder. If the ladder is not secured properly any movement could jeopardize the seal.



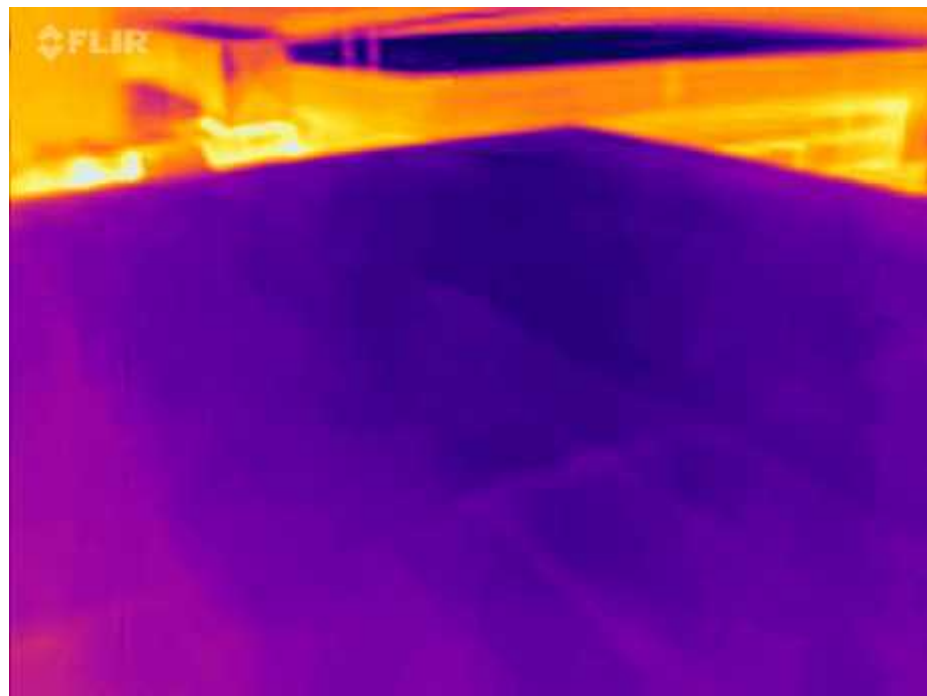
Flir One Photo looking southeast on section G, no anomalies detected.



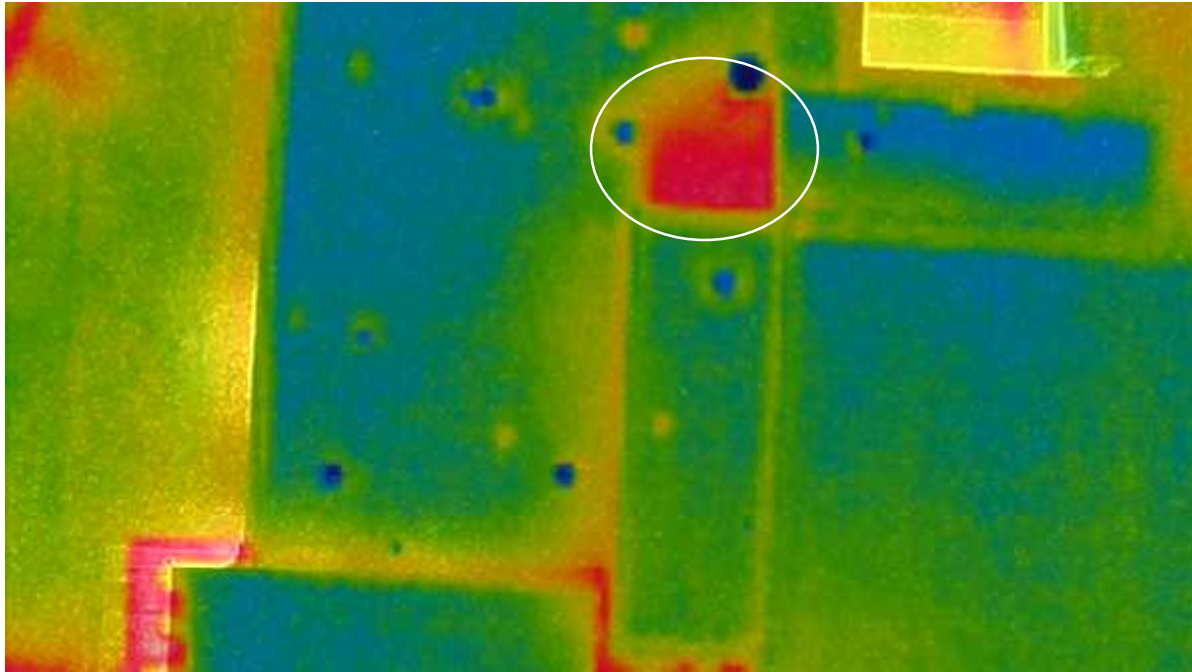
Flir One Photo looking northeast on section G, no anomalies detected.



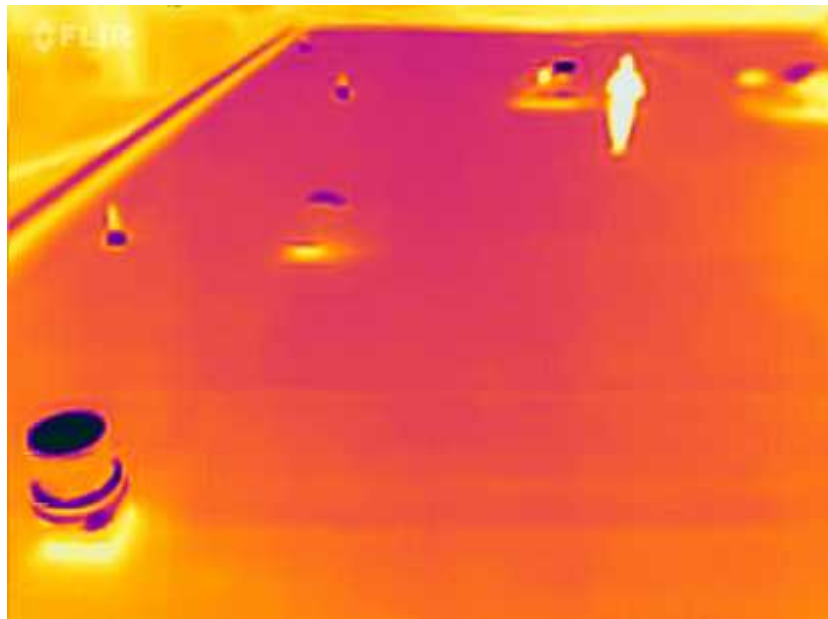
Flir One Photo looking southeast on section I, no anomalies detected.



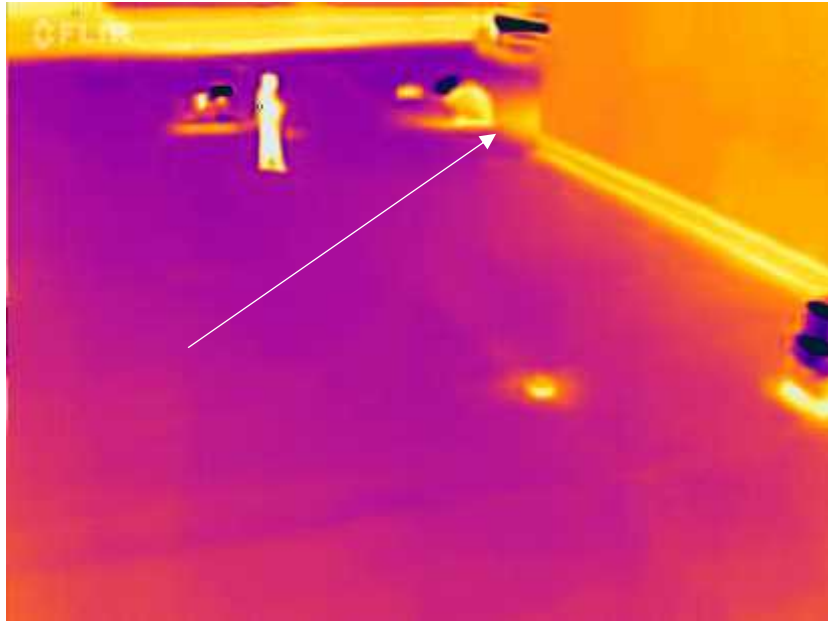
Flir One Photo looking northeast on section I, no anomalies detected.



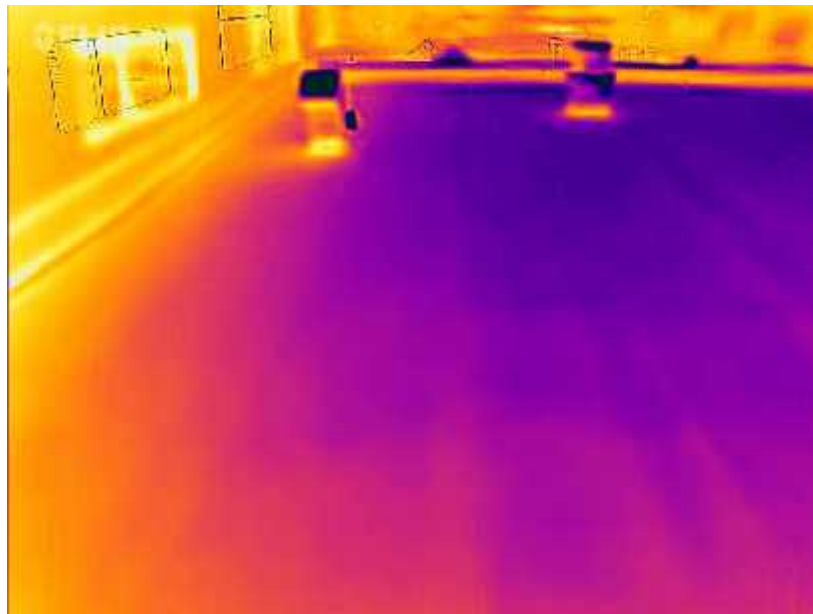
Moving north onto section C a large anomaly can be seen just to the north of section F, suspected wet area although several vents in the area could make this a false positive but an invasive test will need to be conducted to kind out with certainty that the area does have moisture in the system (area circled in white). Section F has no anomalies detected.



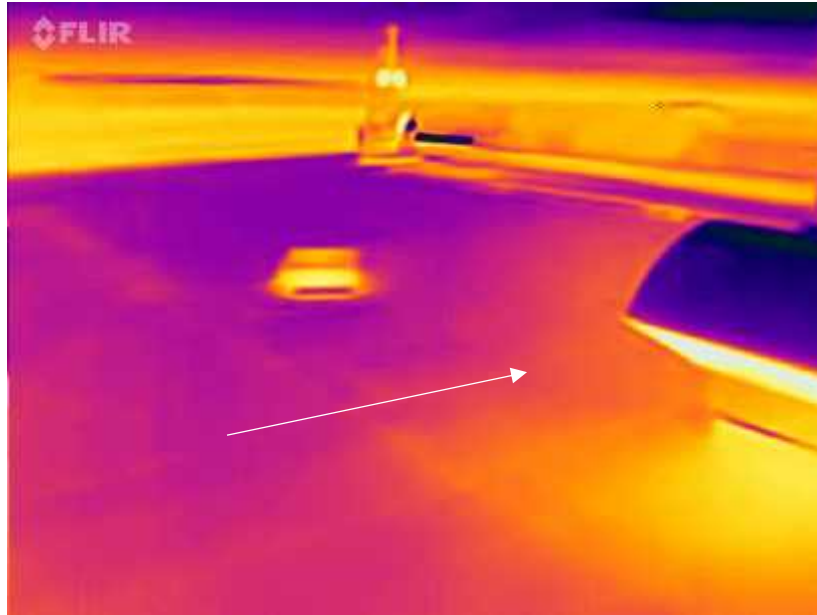
Flir One Photo standing on section G looking north to section C, no anomalies found.



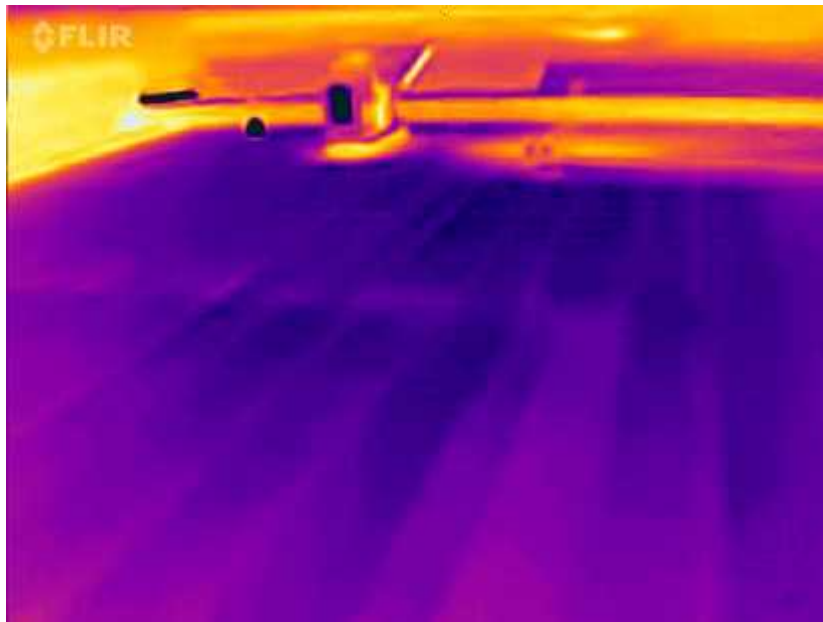
Flir One Photo standing on section G looking north to section C, anomaly found just west of section D, Invasive test will need to be conducted to confirm moisture in the system.



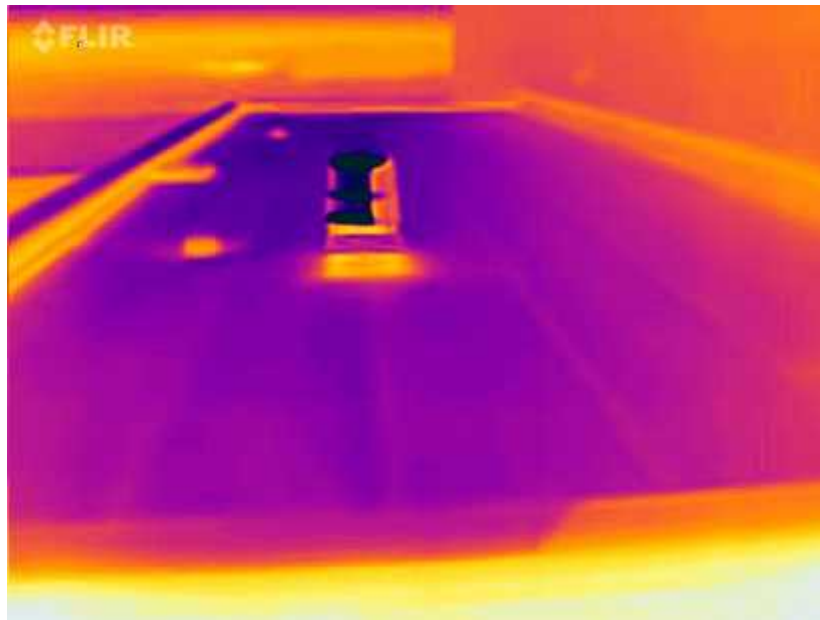
Flir One Photo standing below section F looking to the east, no anomalies detected.



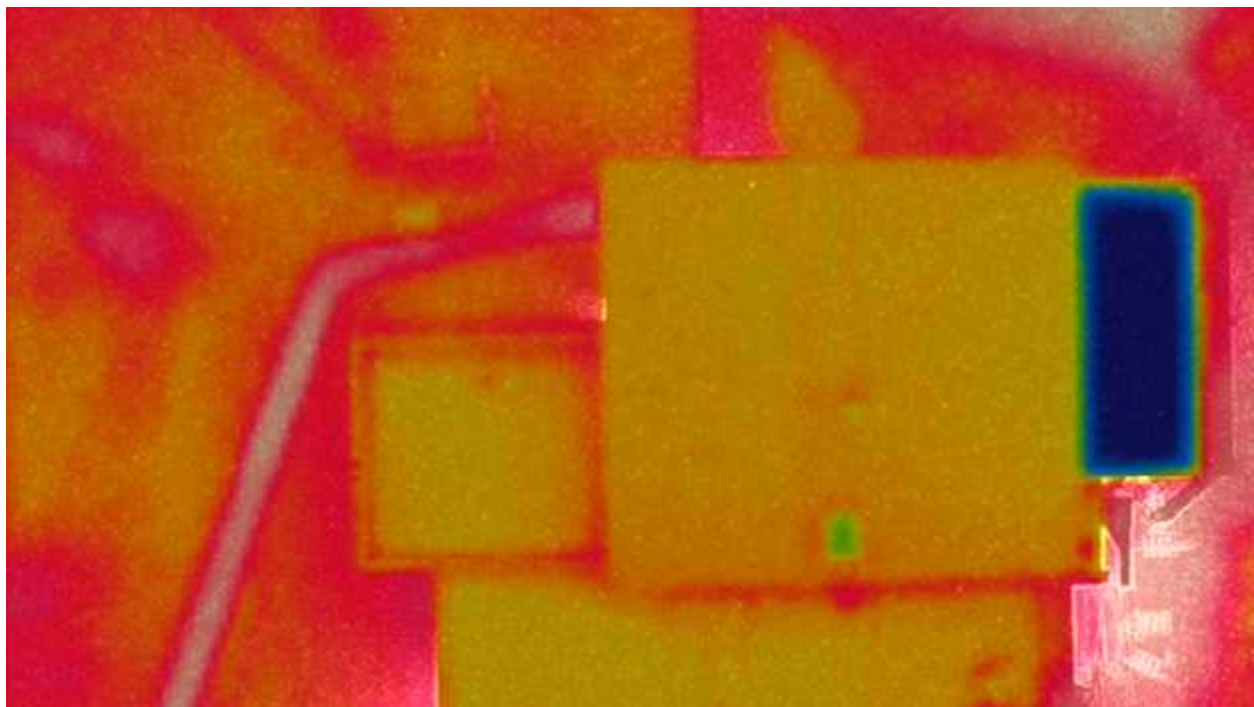
Flir One Photo standing on section C looking northeast, anomaly detected but could be because of multiple heat vents invasive testing will be required



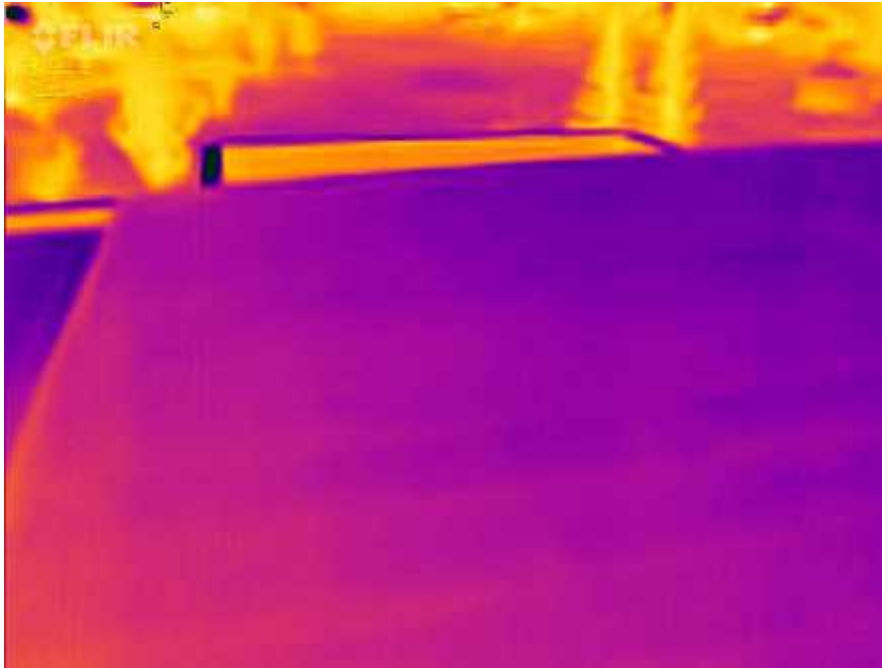
Flir One Photo standing on the north side of section C looking east, an exhaust vent is heating up the system creating a false positive. No suspected wet areas.



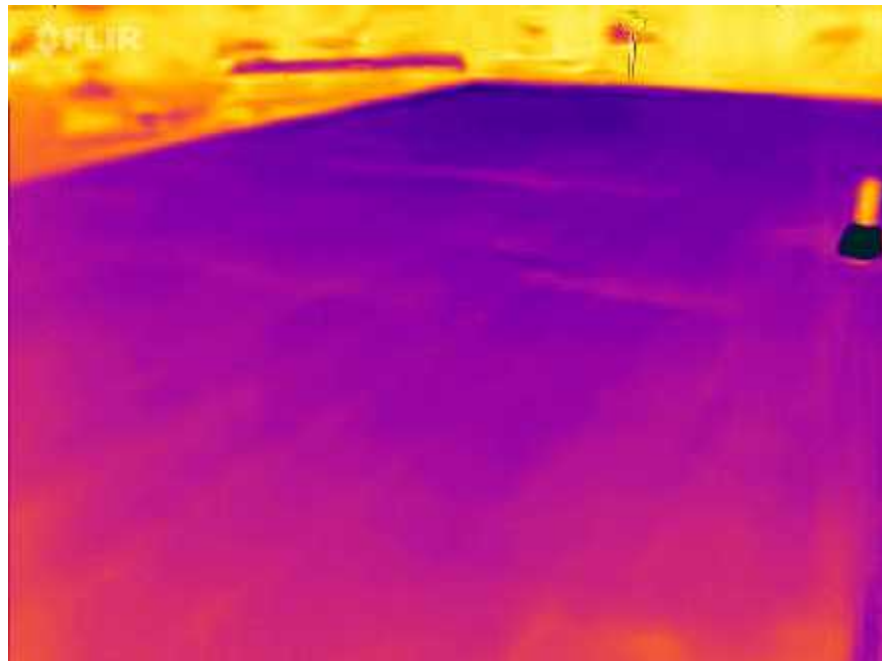
Flir One Photo standing on section C looking at section D to the east, no anomalies found in this section



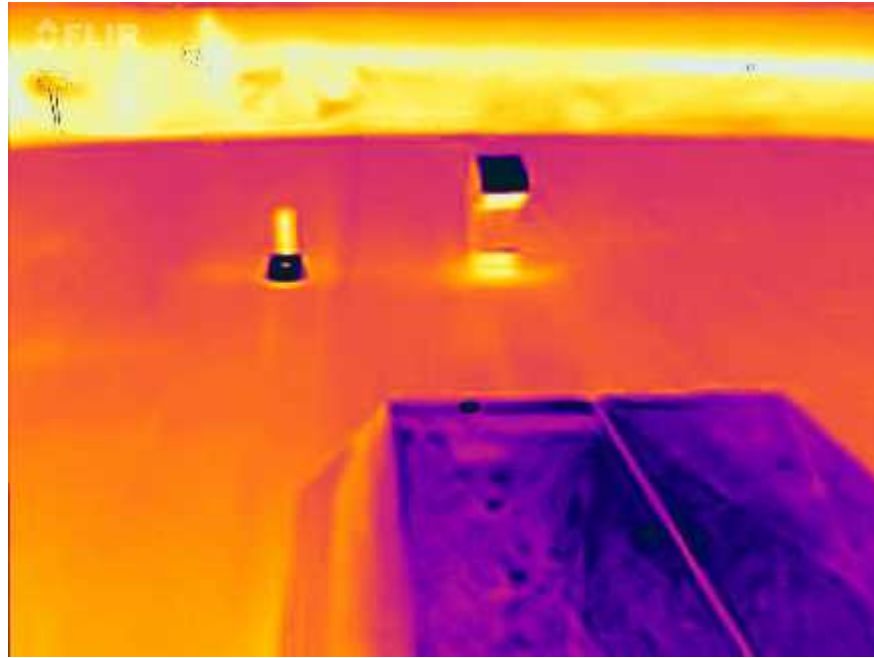
Moving north to sections A and B the color palette on this picture has changed dramatically because of the cold metal roof to the east. Section A and B have no indication of moisture infiltrating the system.



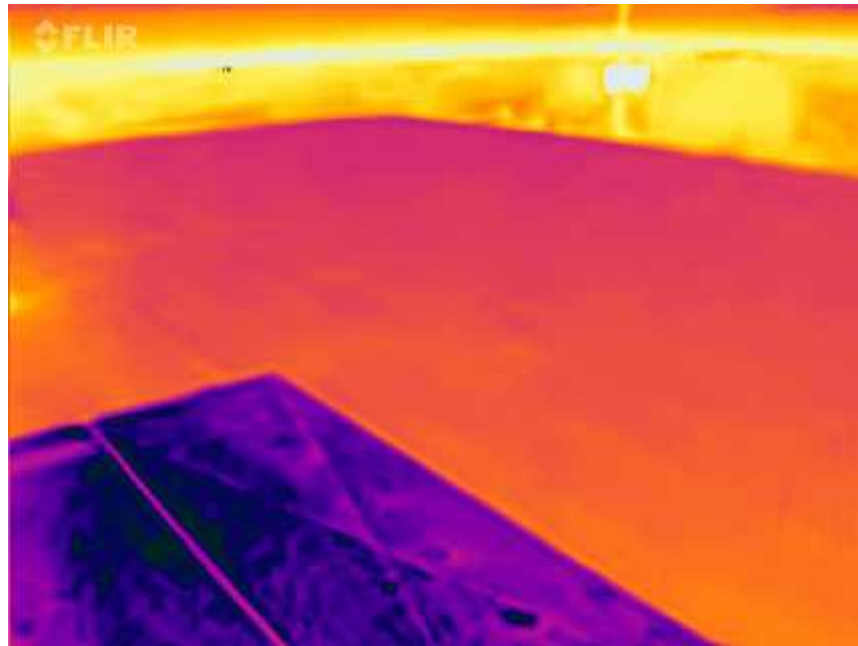
Flir One Photo standing on section A looking to the east, no anomalies detected.



Flir One Photo standing on section A looking northwest, no anomalies detected.



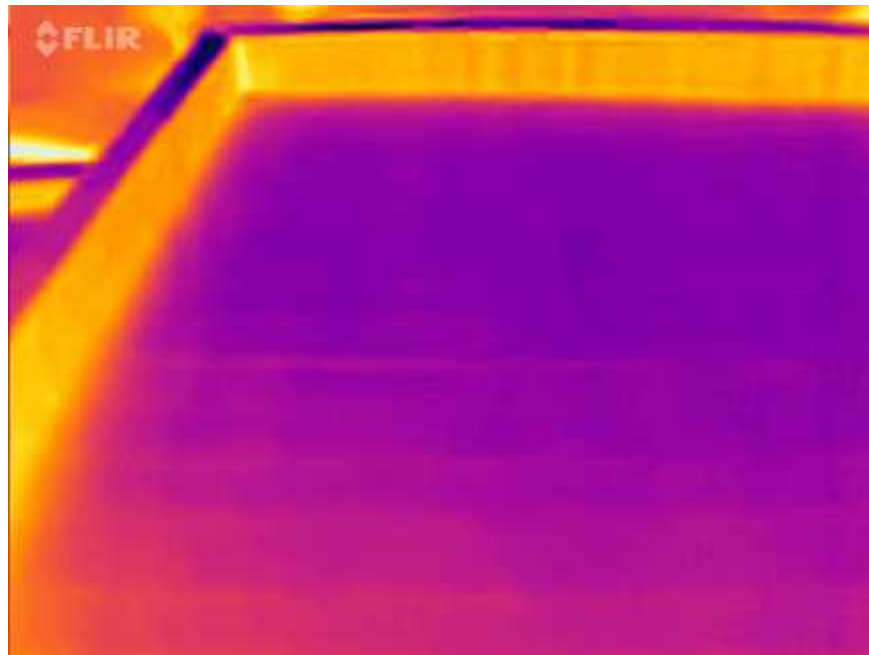
Flir One Photo standing on section A looking north, no anomalies found.



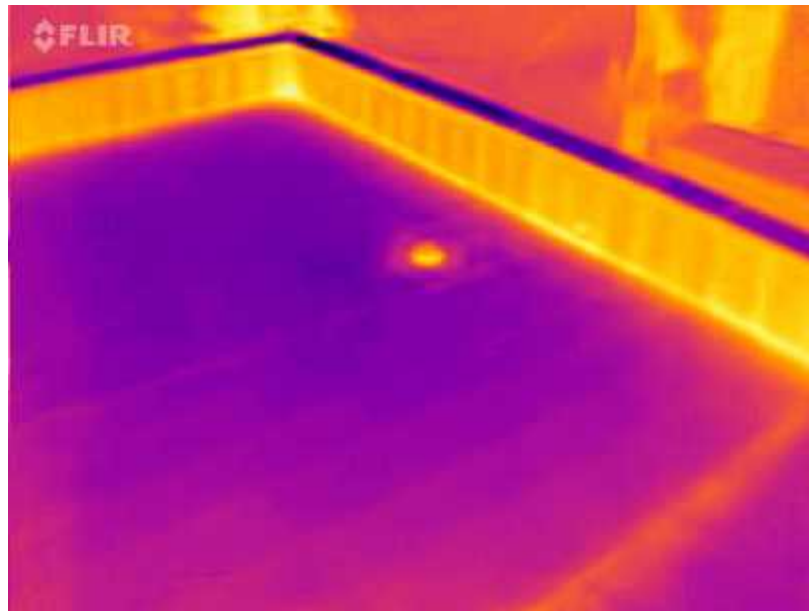
Flir One Photo standing on section A looking northwest, no anomalies found.



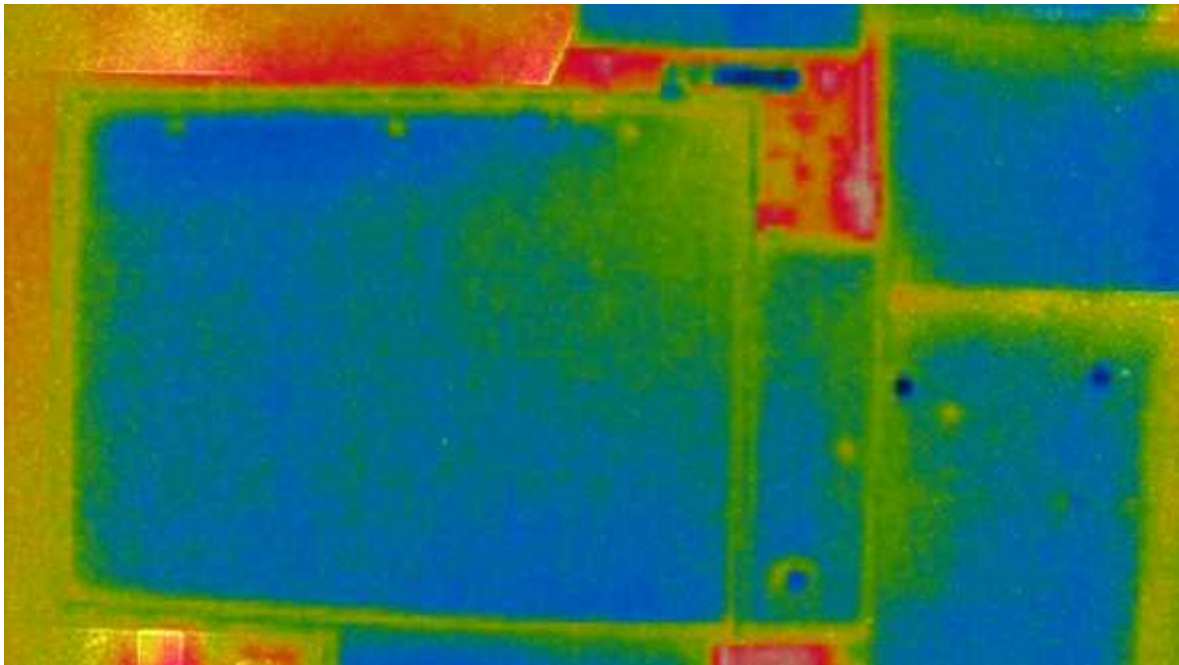
Flir One Photo standing on section A looking west, no anomalies found.



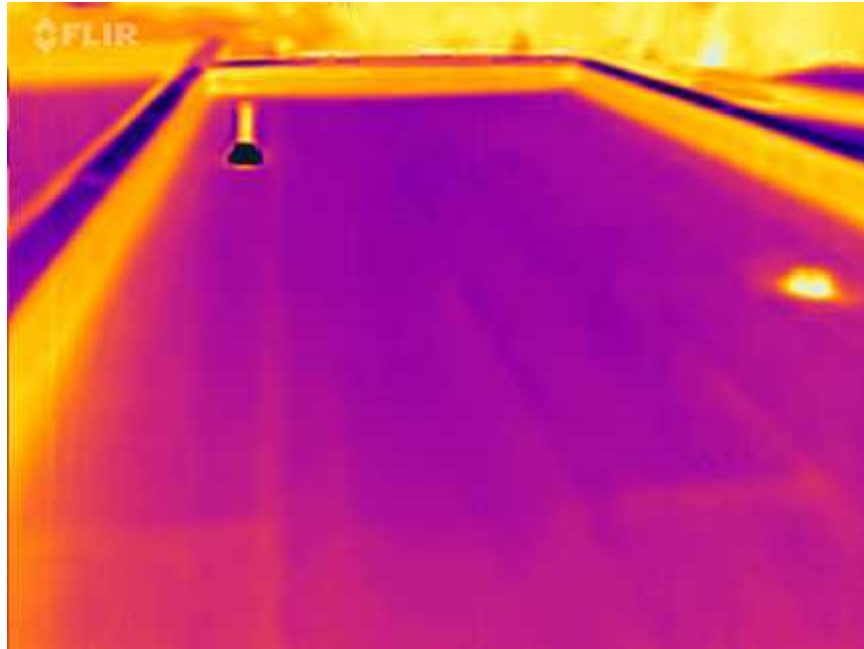
Flir One Photo standing on section A west to section B, no anomalies detected.



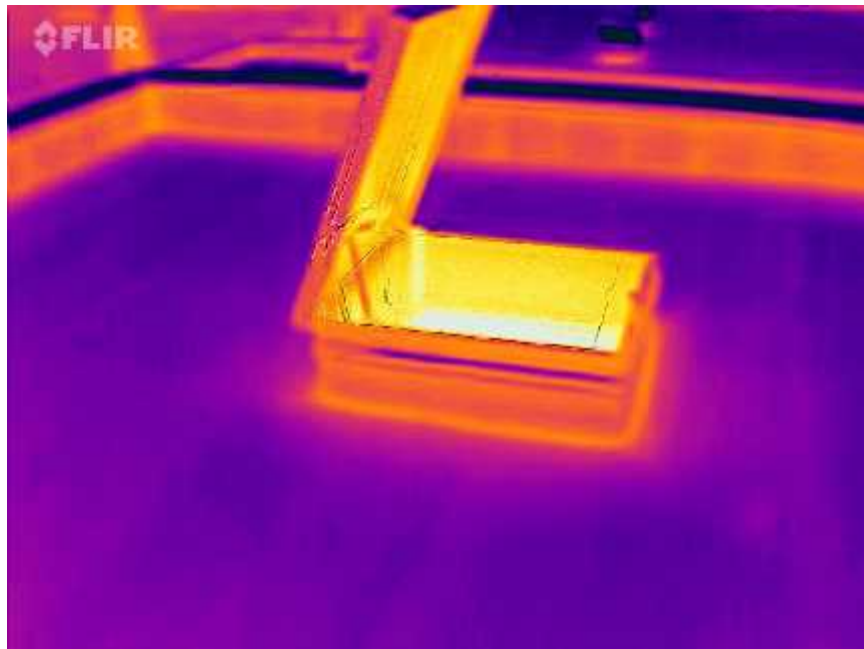
Flir One Photo standing on section A northwest to section B, no anomalies



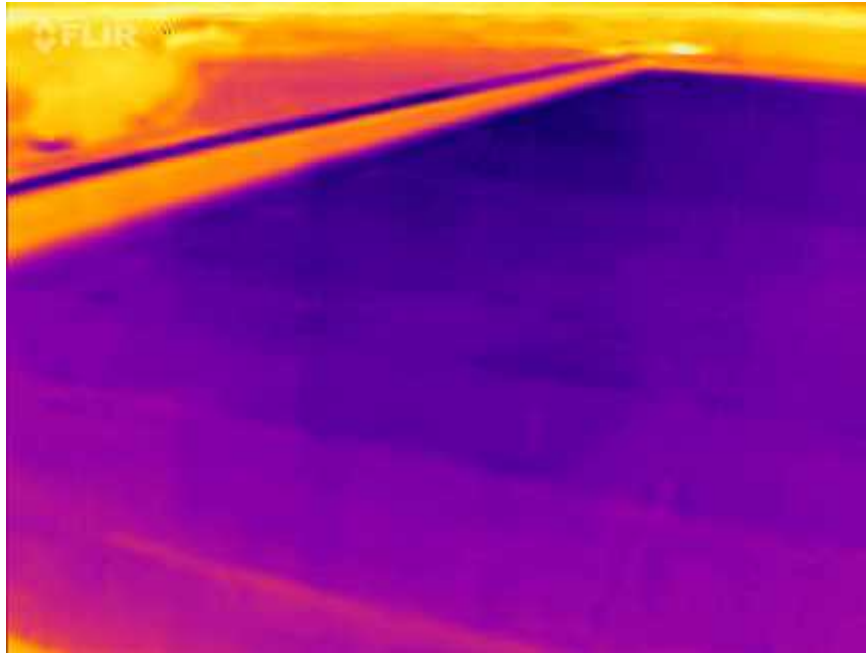
Moving to the east, the gym roof (section E and F) have no indication of water infiltrating the system.



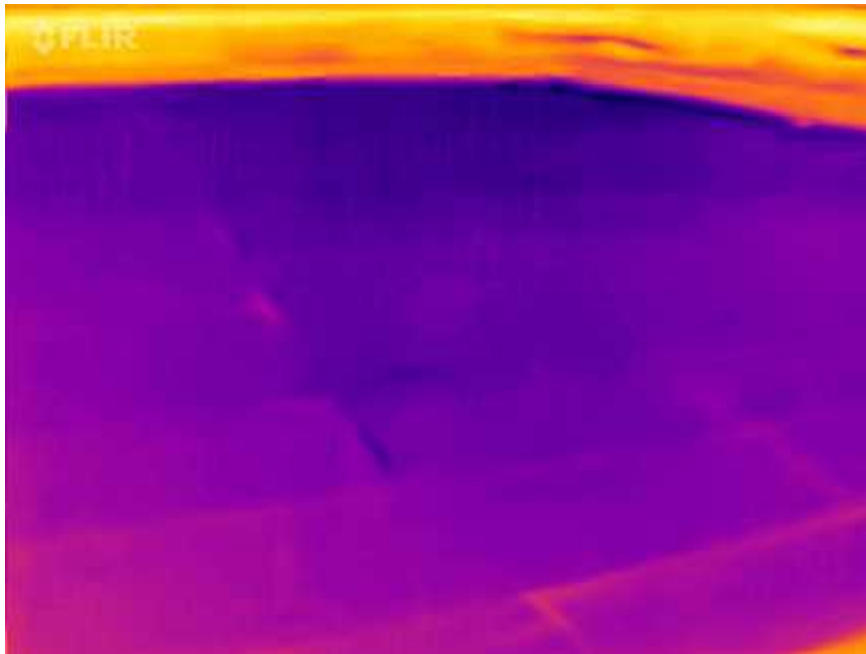
Flir One Photo standing on section F looking south at the hatch, no anomalies detected.



Flir One Photo standing on section F looking north at the hatch, no anomalies detected.



Flir One Photo standing on section f looking southeast to section E, no anomalies detected.



Flir One Photo standing on section A looking south to section E, no anomalies detected.



Conclusion

In conclusion O'Neil Consulting found two areas possibly containing infiltrated water, section H underneath the ladder leading up to section G. Section C, just west of section D. Both of those sections will need to be invasively tested to confirm or debunk the findings of the thermal scan.

Due to the shape of this roof O'Neil Consulting thinks this building would be an excellent candidate for a recap project in the near future.

Attending Inspector Name:

Matt O'Neil

Certified Thermographer.

Signature: