



Project Profile



Built in the 1950s, the Beth Emet Synagogue is an approximately 25,000 square foot religious facility. The exterior walls of the 2-story structure are primarily clad with limestone. The roofing systems are comprised of a combination of low-slope and steep-slope roofs. The low-slope roofs are covered with a modified bitumen membrane roofing system over a poured gypsum deck. The eastern portion of the facility consists of steep-slope roofs covered with standing seam copper panels.

Various repairs had been completed over the years on the low-slope roofs. A water leakage event was also experienced which resulted in infiltration into the facility. Our services were initially requested to perform an evaluation of the reported water infiltration. Water testing was performed by BTC at the roof and around the roof drains and expansion joints, and it was ultimately determined that the roof drain flashing was deficient resulting in water leakage.

Following BTC's initial evaluation, it was also determined that the roof above the education building was nearing the end of its service life and that a roof replacement project should be implemented.

BTC prepared design documents for the roof replacement. The new assembly consisted of a vapor retarder, adhesively-attached tapered roof insulation, coverboard, and a 2-ply modified bitumen roofing system, including associated flashings. Fully-reinforced liquid-applied flashing was provided along with new sheet metal counterflashings, and custom copings and edge metal. In addition, removal and replacement of sealant at limestone coping joints was included to ensure the roof and adjacent components would remain water-tight and leak free.

BTC provided bidding assistance, and performed construction phase services during the roof replacement.

Project Name:

*Beth Emet the Free Synagogue
Roof Replacement*

Project Location:

*Beth Emet the Free Synagogue
1224 Dempster Street
Evanston, Illinois 60202*

Client:

*Beth Emet the Free Synagogue
1224 Dempster Street
Evanston, Illinois 60202*

Approximate Construction Cost:

\$272,000

Year Completed:

2023

Nature of Services:

*Roof Replacement, Design Assistance,
Bidding Assistance, Construction
Contract Administration*

