

TGKX.537 - ROOF DECK CONSTRUCTIONS

Design/System/Construction/Assembly Usage Disclaimer

- Authorities Having Jurisdiction should be consulted in all cases as to the particular requirements covering the installation and use of UL Certified products, equipment, system, devices, and materials.
- Authorities Having Jurisdiction should be consulted before construction.
- Fire resistance assemblies and products are developed by the design submitter and have been investigated by UL for compliance with applicable requirements. The published information cannot always address every construction nuance encountered in the field.
- When field issues arise, it is recommended the first contact for assistance be the technical service staff provided by the product manufacturer noted for the design. Users of fire resistance assemblies are advised to consult the general Guide Information for each product category and each group of assemblies. The Guide Information includes specifics concerning alternate materials and alternate methods of construction.
- Only products which bear UL's Mark are considered Certified.

Roof Deck Constructions

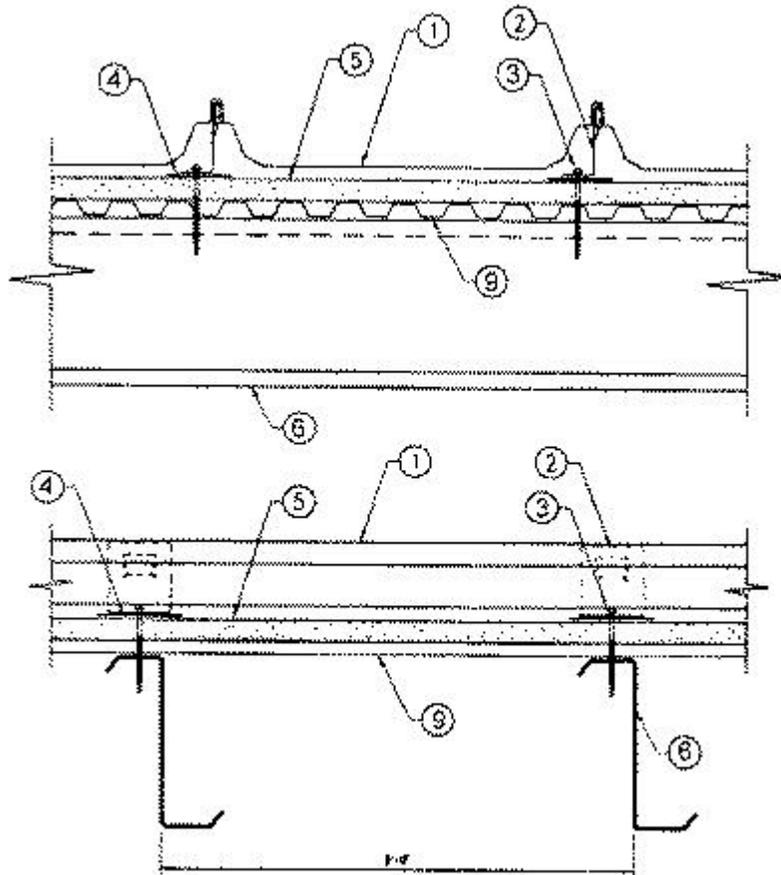
See General Information for Roof Deck Constructions

Construction No. 537

April 19, 2012

Uplift — Class 90

Fire Not Investigated



1. **Metal Roof Deck Panels*** — No. 24 MSG min. Coated steel panels continuous over two or more spans. End laps to occur adjacent to purlin with panels overlapped 3 inch max. End lap to include back-up plate (Item No. 2A). A line of sealant may be used at panel end and side laps.

A & S BUILDING SYSTEMS L P (View Classification) — "Ultra-Dek"

B C STEEL BUILDINGS INC (View Classification) — "BCL-SD"

CENTRAL STATES MFG INC (View Classification) — "Central-Loc"

CENTRAL TEXAS METAL ROLLFORMING INC (View Classification) — "Shurloc 300"

MBCI (View Classification) — "Ultra-Dek"

MESCO METAL BUILDINGS (View Classification) — "Ultra-Dek"

NCI BUILDING SYSTEMS L P (View Classification) — "Ultra-Dek"

PINNACLE STRUCTURES INC (View Classification) — "PINNACLE U-DEK"

TEXAS BUILDING AND ROOFING SUPPLIES INC — "Standing Seam" Panel

UNITED STRUCTURES OF AMERICA INC (View Classification) — "Guardian I" or "Guardian II"

WHIRLWIND STEEL BUILDINGS INC (View Classification) — "Super-Seam II"

2. **Roof Deck Fasteners* — (Panel Clips)** — Clip to engage the metal roof deck panel rib (Item 1). One clip to be used at each purlin location. Guide holes in the bottom of clip to accommodate two (2) screw fasteners.(Item 3).

BUILDING PRODUCTS DEVELOPMENT INC (View Classification) — "NC34503", "NC34504"

NCI BUILDING SYSTEMS L P (View Classification) — "Ultra-Dek Floating Clip" or "Ultra-Dek Sliding Clip".

2A. **Roof Deck Fasteners* — (End lap Back-Up Plate)** — (Not Shown) No. 16 MSG minimum gauge coated steel.

NCI BUILDING SYSTEMS L P (View Classification) — "Back-Up Plate"

3. **Fasteners — (Screws)** — Fasteners to attach panel clips and bearing plates (Item Nos. 2 and 4) through rigid (Item No. 5) insulation and liner panel (Item No. 11) into steel purlin (Item 6) to be No. 14 self-tapper. Fastener length to be a minimum of 1/2 inch longer than the total thickness of the rigid insulation (Item No. 5) and the metal liner panel (Item No. 9). Two (2) fasteners per clip. As an alternate fastener a No. 12 self-drilling, self-tapping fastener may be used. Fasteners used at end laps to be 1/4-14 by 1 inch long self-drilling, hex-head plated steel screws with 5/8 inch O.D. metal backed sealing washer. Alternate fastener at end laps to be No. 14 by 1 1/4 self-drilling, self-tapping hex-head plated steel screw with 5/8 inch O.D. metal backed sealing washer. Spacing for end lap screws to be 3 1/4, 3 1/2, 3 1/2, 3 1/2, 3 1/4 inch pattern. An additional fastener is to be located at the second slanted segment of the rib on both sides of the panel. (8 fasteners per panel).

4. **Bearing Plate** — No. 16 MSG gauge coated steel flat bearing plate. Used under panel clips (Item No. 2) for support .

5. **Rigid Insulation** — Foamed plastic, minimum 1 inch thickness, maximum thickness 6 inches.

6. **Purlins** — No. 16 MSG minimum thickness steel (minimum yield strength 40,000 psi) or min. "H" series open-web joists.

7. **Building Units** — (Optional) (Not Shown)- Translucent reinforced plastic panels. Nominal thickness 1/16 inch, formed to the same configuration as the metal roof deck panel pans, with reinforcement cut from classified metal roof deck panels (Item No. 1). Metal reinforcement attached to translucent reinforced plastic side segments with aluminum pop rivets. Panels continuous over two or more spans.

NCI BUILDING SYSTEMS L P (View Classification) — "Ultra-Dek Light Transmitting Panel"

8 **Reinforcing Plate** — (Not Shown)- No. 18 MSG minimum gauge coated steel, 6 inches wide two vertical legs on both sides and formed to the configuration of the metal roof deck panel (Item No. 1). Used at the mid-span purlin of building unit (Item No. 7).

9. **Liner Panel** — (Optional) No. 29 MSG minimum thickness coated steel. Min depth 9/16 inches with ribs spaced at 2.57 inches O.C. (Minimum Yield 80,000 psi).

*** Indicates such products shall bear the UL or cUL Certification Mark for jurisdictions employing the UL or cUL Certification (such as Canada), respectively.**

Last Updated on 2012-04-19

The appearance of a company's name or product in this database does not in itself assure that products so identified have been manufactured under UL's Follow-Up Service. Only those products bearing the UL Mark should be considered to be Certified and covered under UL's Follow-Up Service. Always look for the Mark on the product.

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