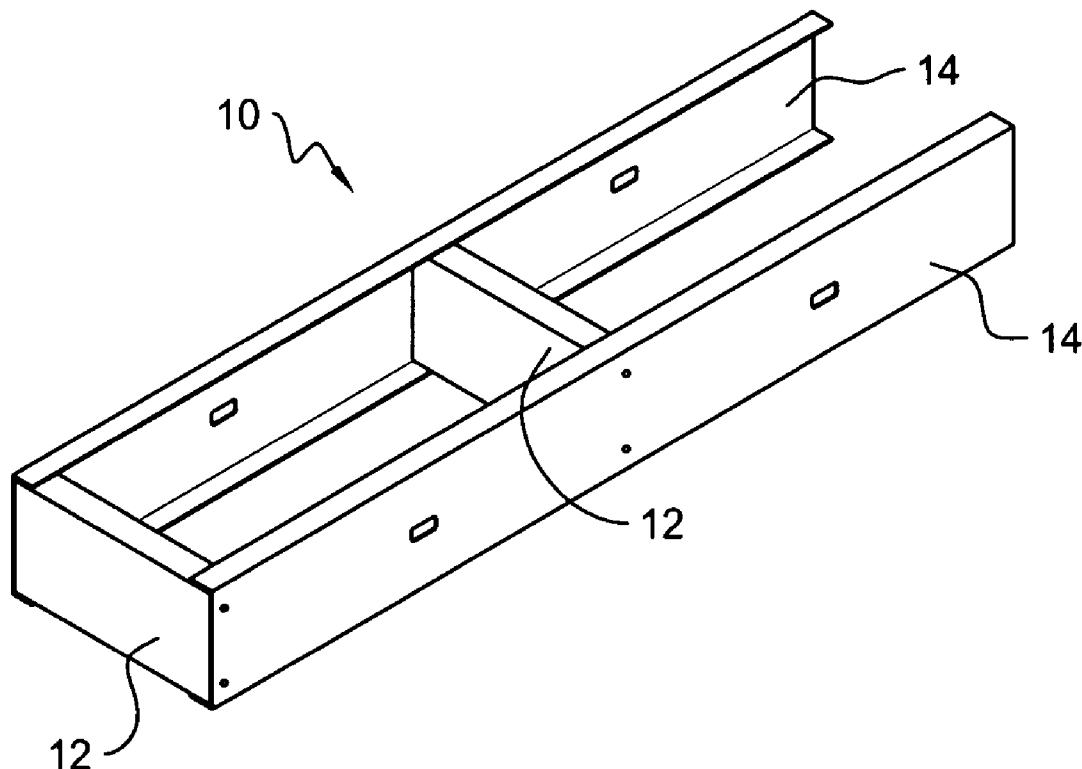


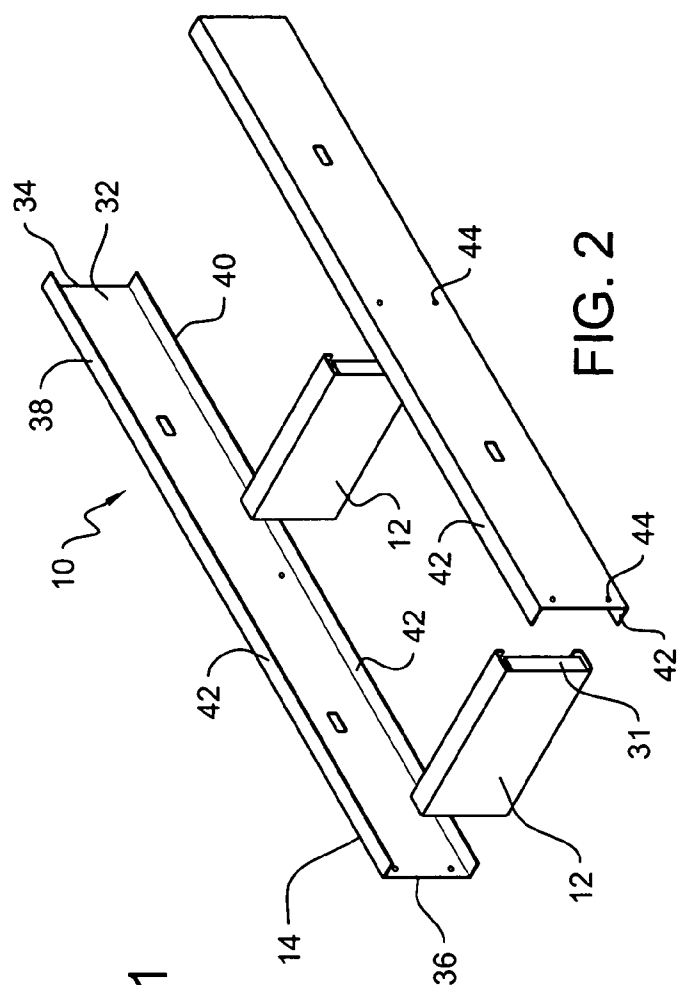
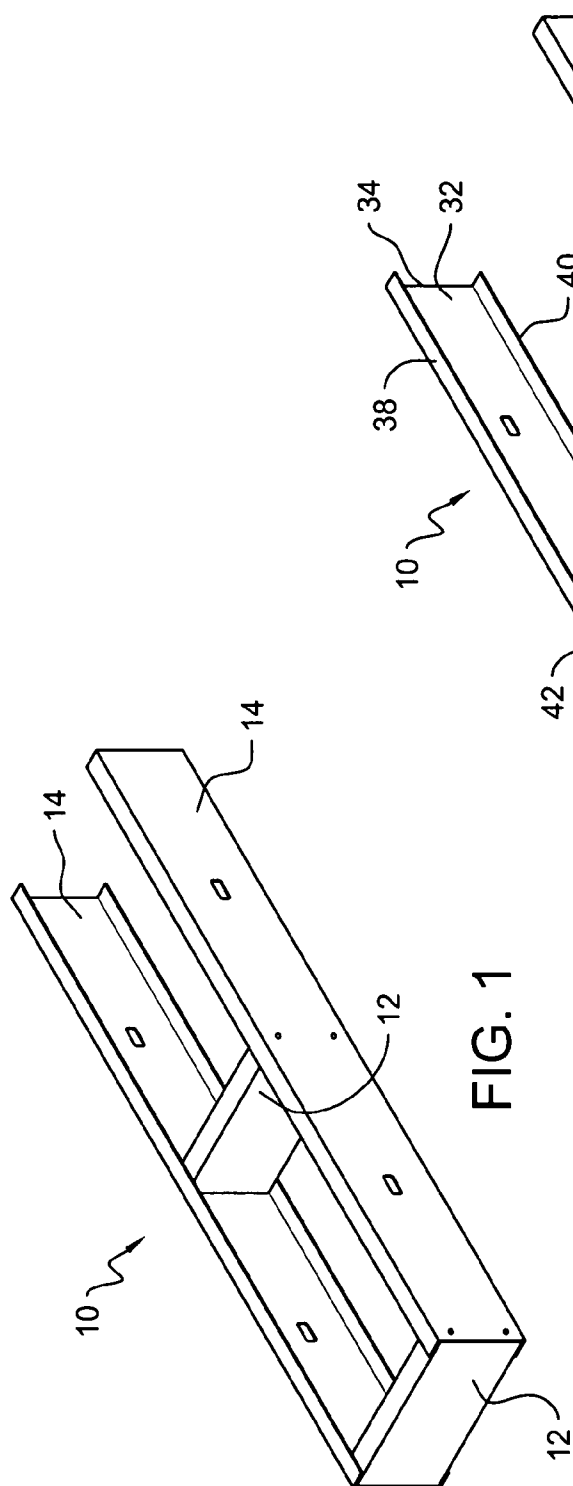


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(19) **United States**(12) **Patent Application Publication**
Meek et al.(10) **Pub. No.: US 2004/0144057 A1**(43) **Pub. Date: Jul. 29, 2004**(54) **FRAMING SYSTEM FOR BUILDINGS****Publication Classification**(75) Inventors: **Michael Alan Meek**, Phoenix, AZ
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CHICAGO, IL 60606 (US)(57) **ABSTRACT**(73) Assignee: **Allied Tube & Conduit Corporation**,
Harvey, IL(21) Appl. No.: **10/683,947**(22) Filed: **Oct. 10, 2003****Related U.S. Application Data**(60) Provisional application No. 60/442,696, filed on Jan.
27, 2003.

A framing system for buildings that includes a plurality of studs and track mounted together to form a unique framing system. Each stud defines a longitudinally extending body, opposing foldable end flaps, and opposing flanges that extend outwardly from the body. Each of the opposing flanges also includes a second flange that extends outwardly from the opposing flanges at approximately an angle of ninety degrees. Mounted to the plurality of studs is the plurality of track. Each of the plurality of track defines a longitudinally extending track body and opposing track flanges extending outwardly from the track body.





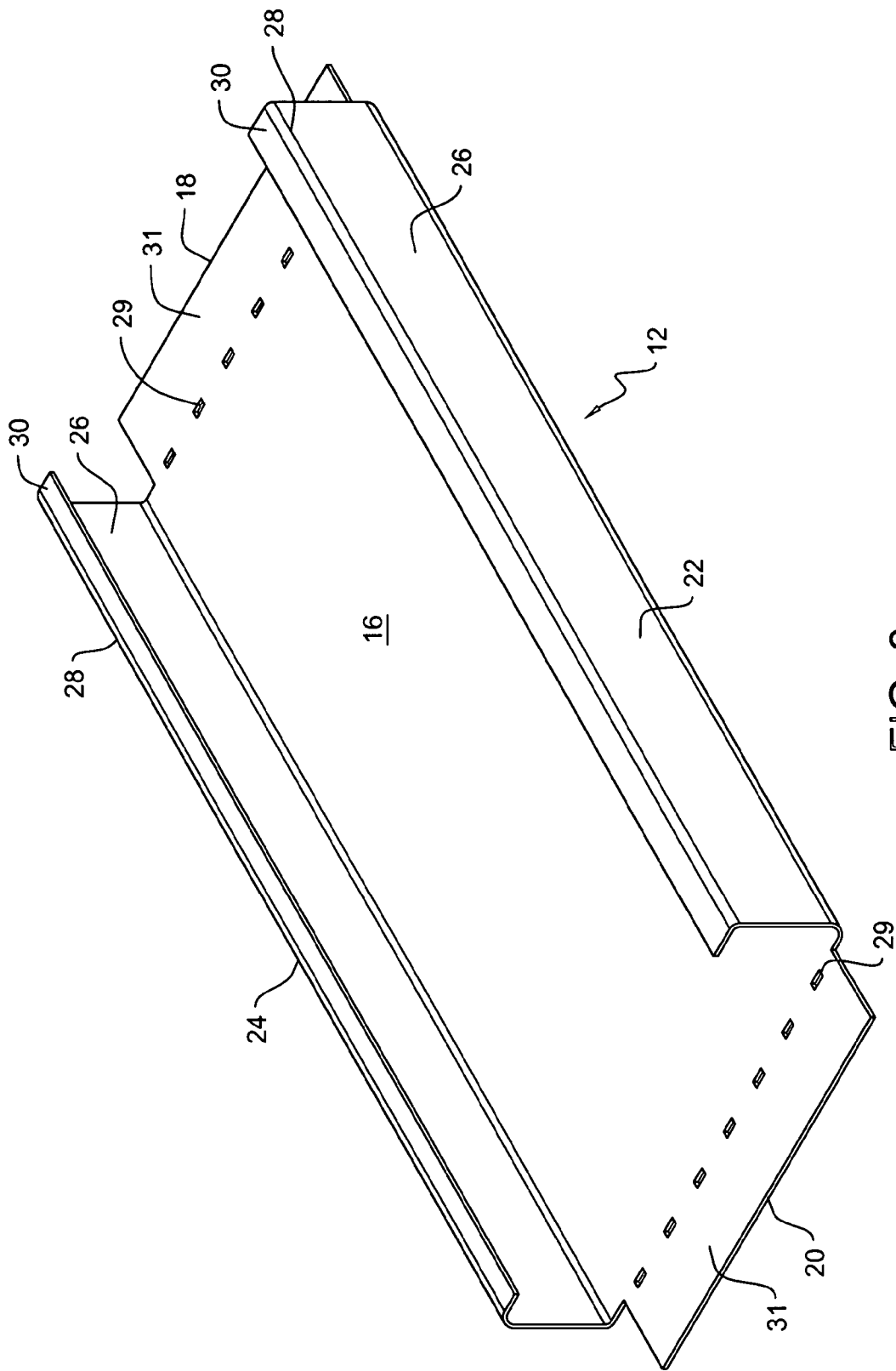


FIG. 3

FRAMING SYSTEM FOR BUILDINGS

CROSS-REFERENCE TO RELATED APPLICATION

[0001] This Non-Provisional Application claims benefit to U.S. Provisional Application Serial No. 60/442,696 filed Jan. 27, 2003.

FIELD OF THE INVENTION

[0002] The present invention relates generally to storage and other buildings and more specifically to framing systems for storage and other buildings.

BACKGROUND OF THE INVENTION

[0003] Storage buildings, sheds, and other similar buildings are quite known as providing a sheltered structure for numerous items, such as automobiles, agricultural equipment, gardening equipment, and the like. These structures are typically in an outdoor environment and must withstand various, and sometimes extreme, weather conditions. The underlying framing systems of these known buildings is what provides the durability to withstand the sometimes extreme environmental conditions. It has become apparent that improvements in the framing system results in improvements in the durability and longevity of the building. Consequently, there is a continuing need for improvements in the underlying framing structure that supports the storage building, shed, or other similar building.

[0004] The present invention is directed at such an improvement over existing framing systems.

BRIEF SUMMARY OF THE INVENTION

[0005] The present invention is directed to a framing system for storage buildings, sheds, shelters, houses or other buildings that store, house, or contain various items and things. The framing system of the invention is directed to framing structures that use studs and track as the supporting structure. The invention is particularly useful as the underlying framing structure for the floor of a building. Under the present invention, each stud defines a longitudinally extending body and opposing flanges that extend outwardly from the body. Each flange also includes a second flange that extends outwardly from the opposing flanges at approximately an angle of ninety degrees. Each stud also defines opposing foldable end flaps. Mounted to the plurality of studs at the end flaps is the plurality of track. Each track defines a longitudinally extending track body and opposing track flanges extending outwardly from the track body. As a system, the studs and track of the invention create a stronger and more durable framing structure over known structures.

BRIEF DESCRIPTION OF THE DRAWINGS

[0006] FIG. 1 shows an isometric view of the framing system of the present invention.

[0007] FIG. 2 shows an exploded isometric view of the invention of FIG. 1.

[0008] FIG. 3 shows an isometric view of the stud of the invention of FIG. 1.

[0009] Other features and advantages of the invention will become apparent to those skilled in the art upon review of

the following detailed description, claims and drawings in which like numerals are used to designate like features.

DETAILED DESCRIPTION OF THE INVENTION

[0010] The invention may be embodied in various forms. Referring to the Figures wherein like numerals are used to designate like features, there is depicted in FIG. 1 a framing system 10 of the present invention. The framing system 10 includes a plurality of studs 12 and a plurality of track 14 that are mounted together to make a portion of the underlying frame for a building, such as a storage building, shed, shelter, house or other similar buildings. The framing system 10 is particularly useful as the frame underlying the floor of a storage building or shed. The individual studs 12 and track 14 are further depicted in FIG. 2.

[0011] Referring to FIG. 3, the stud 12 defines a longitudinally extending body 16 having opposing ends 18, 20 and opposing sides 22, 24. Extending outwardly from the sides 22, 24 of the body 16 are opposing flanges 26. The flanges extend outwardly at approximately an angle of 90 degrees from the body 16. Located at the ends 28 of the flanges 26 are second opposing flanges 30 that extend outwardly at approximately an angle of 90 degrees from the flanges 26. As depicted, the flanges 30 extend parallel to the body 16 and toward the longitudinal center of the body 16. The body 16 and flanges 26, 30 form a stud that has a C-shaped cross section. One of skill in the art will understand that other similar stud shapes and configurations are possible.

[0012] Located at the ends 18, 20 of the stud 12 are a plurality of holes or slots 29 positioned linearly and extending transversely across the body 16 of the stud. Also located at the ends 18, 20 are foldable end flaps 31 that, as depicted, are foldable along the plurality of holes 29. The foldable flaps define a mounting surface on which the track 14 may be attached and also serve as a stiffener for the stud 12. As depicted, the track 14 may be mounted to the stud 12 at various positions along the track 14.

[0013] Referring to FIG. 2, the track 14 includes a longitudinally extending body 32 with opposing ends 34, 36 and opposing sides 38, 40. Extending outwardly from the opposing ends 34, 36 are opposing flanges 42. The opposing flanges 42 extend outwardly at an angle of approximately 90 degrees from the body 32. Mounting holes 44 are positioned along the body 32 of the track to permit the mounting of the track 14 to the stud 12 and specifically to the end flaps 31 of the stud 12. As is known in the art, fasteners or rivets or the like may be used to mount the track 14 to the stud 12. Again, one skilled in the art will understand that other shapes and configurations of the track are possible.

[0014] The stud 12 and track 14 are preferably made of flat rolled carbon steel with a galvanized zinc coating for added corrosion resistance. It should be understood by those skilled in the art that other suitable materials may be used with the present invention depending on the application and the environment in which the framing system is to be used.

[0015] While the invention has been described with respect to specific examples including presently preferred modes of carrying out the invention, those skilled in the art will appreciate that there are numerous variations and permutations of the above described systems and techniques that fall within the spirit and scope of the invention as set forth in the appended claims.

What is claimed is:

1. A framing system for storage buildings comprising:
 - a plurality of studs, each stud defining a longitudinally extending body and opposing first flanges extending outwardly from the body at approximately an angle of ninety degrees, each stud further defining opposing second flanges extending outwardly from the opposing first flanges at approximately an angle of ninety degrees, each stud also defining opposing foldable end flaps,
 - a plurality of track mounted to the plurality of studs, each track defining a longitudinally extending track body and opposing track flanges extending outwardly from the track body at an angle of approximately ninety degrees.
2. The framing system of claim 1 wherein the plurality of track further include a plurality of mounting holes for the mounting of the track to the stud.
3. The framing system of claim 2 wherein the track is mounted to the foldable end flaps of the stud.
4. The framing system of claim 3 wherein the plurality of track and the plurality of studs are made from a carbon steel with a galvanized zinc coating.

5. A framing system for storage buildings comprising:

- a plurality of studs, each stud defining a longitudinally extending body and opposing first flanges extending outwardly from the body at approximately an angle of ninety degrees, each stud further defining opposing second flanges extending outwardly from the opposing first flanges at approximately an angle of ninety degrees, each stud also defining opposing foldable end flaps,
 - a plurality of track mounted to the plurality of studs, each track defining a longitudinally extending track body and opposing track flanges extending outwardly from the track body at an angle of approximately ninety degrees, each track also includes a plurality of mounting holes for the mounting of the track to at least one of the plurality of studs.
6. The framing system of claim 5 wherein the track is mounted to the foldable end flaps of the stud.
 7. The framing system of claim 6 wherein the plurality of track and the plurality of studs are made from a carbon steel with a galvanized zinc coating.

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