

**IN THE UNITED STATES DISTRICT COURT
FOR THE WESTERN DISTRICT OF TEXAS
AUTIN DIVISION**

CONCRETE SUPPORT SYSTEMS, LLC,)	
)	
Plaintiff,)	
)	
v.)	Civil Action No. <u>1:20-cv-01150-LY</u>
)	
BOND FORMWORK SYSTEMS, LLC;)	Complaint for Patent
)	Infringement
and)	(U.S. Patent No. 10,024, 069)
)	
BRADLEY BOND)	
)	JURY DEMANDED
Defendants)	
)	
)	
)	
)	
)	
)	
)	

FIRST AMENDED COMPLAINT FOR PATENT INFRINGEMENT

1. Plaintiff CONCRETE SUPPORT SYSTEMS, LLC (“CSS”) files this First Amended Complaint against Defendants BOND FORMWORK SYSTEMS, LLC (“Bond Formwork”) and BRADLEY BOND (“Bond”)(collectively “Defendants”), alleging infringement of U.S. Patent No. 10,024,069. The Accused Products are a grid shoring system and method for erecting concrete platforms in the construction industry.

THE PARTIES

2. Plaintiff CSS is Florida limited liability company organized under the laws of Florida with its principal place of business at 3409 Pelican Landing Parkway, Suite 3, Bonita Springs, FL 34134.

3. Mark Grace, a member of CSS, is domiciled in Texas and resides in Harris County, Texas.

4. CSS is the owner of U.S. Patent Number 10,024,069 entitled “Construction Prop Assembly,” which issued July 17, 2018 (the “’069 Patent”). A copy of the ’069 Patent is attached to the Complaint as Exhibit 1.

5. Defendant Bond Formwork is a Texas limited liability company with its principal place of business at 18735 Mathis Rd., Waller, TX 77484.

6. Defendant Bond is domiciled in Texas and resides at 18735 Mathis Rd., Waller, TX 77484.

JURISDICTION

7. This Court has subject matter jurisdiction pursuant to 28 U.S.C. §§ 1331 and 1338(a) because this action arises under the patent laws of the United States, 35 U.S.C. §§ 1 *et seq.* 15.

8. This Court has personal jurisdiction over Defendants because, directly or through intermediaries, each has committed acts within the District giving rise to this action and/or has established minimum contacts with the District such that the exercise of jurisdiction would not offend traditional notions of fair play and substantial justice.

9. Defendants have committed acts of infringement of the ’069 Patent within this District by making, using, selling, offering for sale, and/or importing in or into this District, products made by practicing the claimed method of the ’069 Patent.

10. Defendants have also placed, and are continuing to place, infringing products into the stream of commerce, via an established distribution channel, with the knowledge and/or understanding that such products are sold in the State of Texas, including this District.

11. On information and belief, Defendants have derived substantial revenues from their infringing acts in this District, including from their manufacturing and sale of infringing products in the United States.

VENUE

12. Venue is proper against Defendants in this District pursuant to 28 U.S.C. § 1400(b) because each has committed acts of infringement in the District and has a regular and established place of business in the Texas. *In re Cray Inc.*, 871 F.3d 1355, 1362-63 (Fed. Cir. 2017). 21.

THE PARTIES' PAST RELATIONSHIP

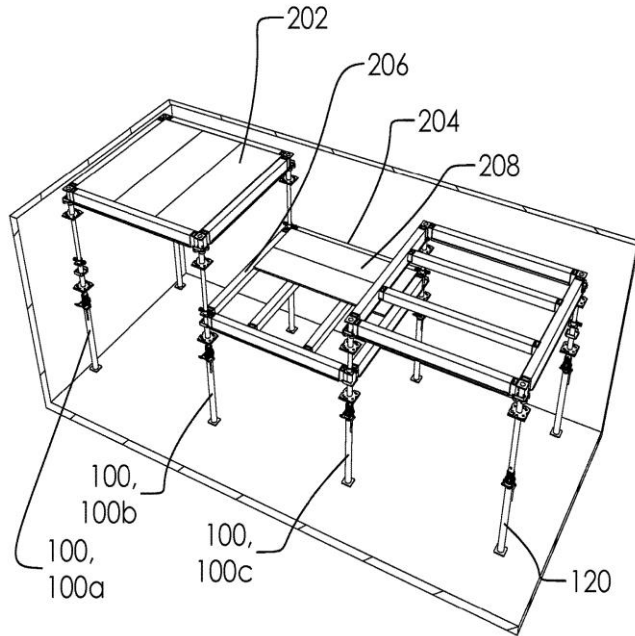
13. Plaintiff incorporates by reference each of the allegations above and further alleges as follows:

14. Plaintiff's patent-in-suit covers technology relating to the scaffolding or shoring systems that are used to support the construction of concrete structures while the concrete hardens. These systems consist of vertical shafts with support plates that hold up crossbeams.

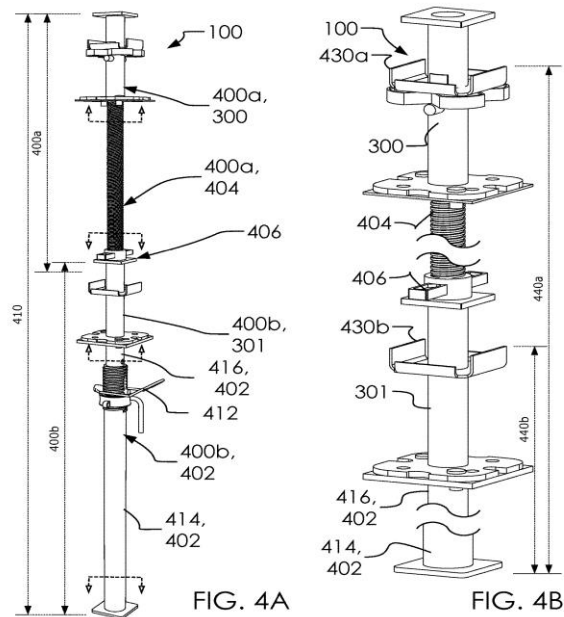
15. Multiple crossbeams in turn support a platform onto which a concrete form can be poured. After the concrete hardens, the shoring system's shafts, crossbeams, and platforms are removed.

16. The patented invention allows for grid shoring shafts to support one or more crossbeams at different heights by affixing a second support plate to the shaft beneath the support plate that sits atop the shaft. Because the upper and lower support plates can be adjusted to different heights, a single shaft can partially support two crossbeams at different heights.

17. An illustration of the '069 Patent is as follows (Figure 2 of the '069 Patent, Exhibit 1):



18. Another illustration of the '069 Patent is as follows (Figure 4 of the '069 Patent, Exhibit 1):



19. Many concrete construction projects require shoring-system support for concrete forms at different levels as shown above.

20. The '069 Patent reduces the number of shoring shafts required and thereby reduces the cost and labor required to shore such structures.

21. The technology covered by the patent-in-suit was developed by Concrete Support Systems of Houston, LLC (CSS-Houston), a joint venture of which CSS owned 70% and Bond Formwork owned 30%.

22. Bond is and has always been the sole owner of Bond Formwork.

23. CSS-Houston was formed in 2013.

24. The inventors of the '069 Patent are Mark Grace, Bradley Bond, and Gunter Sengel.

25. The '069 Patent was assigned to CSS.

26. While joined in CSS-Houston, CSS and Bond developed the technology and submitted the application that resulted in issuance of the patent-in-suit. The application for the patent-in-suit was completed and filed on November 14, 2014 and the patent was issued on July 17, 2018.

27. A settlement between CSS and Bond (attached as Exhibit 2) transferred 100% ownership of CSS-Houston assets to CSS, including all rights in the patent-in-suit.

28. Bond and Bond Formwork have no interest in the '069 Patent.

29. CSS-Houston was dissolved on September 28, 2018.

30. Prior to September 28, 2018, CSS acquired all the assets of CSS-Houston.

DEFENDANTS' USE OF PLAINTIFF'S TECHNOLOGY

31. Plaintiff incorporates by reference each of the allegations above and further alleges as follows

32. Bond, as one of the inventors of the '069 Patent, has knowledge of the patent-in-suit.

33. Defendants are suppliers of construction shoring systems.

34. Bond has publicly emphasized the benefits of shoring systems with the capacity to support multiple crossbeams at different heights on a single shaft. For example, in United States Patent No. 10,711,472 (the “472 patent”)—assigned to Bond—Bond notes that “[r]ecently, platform supports have been developed [that] include both upper and lower head assemblies, allowing the platform supports to position platforms at different heights and support structures at different levels, while reducing the total number of platform supports.” *See* Exhibit 3 (attached).

35. On information and belief, it is impossible to affix a second, lower support plate to a concrete shoring system shaft without infringing the patent-in-suit.

36. Defendant’s infringing product is similar to the ‘069 Patent which is clearly shown in Figures 1 and 2 of the ‘472 Patent:

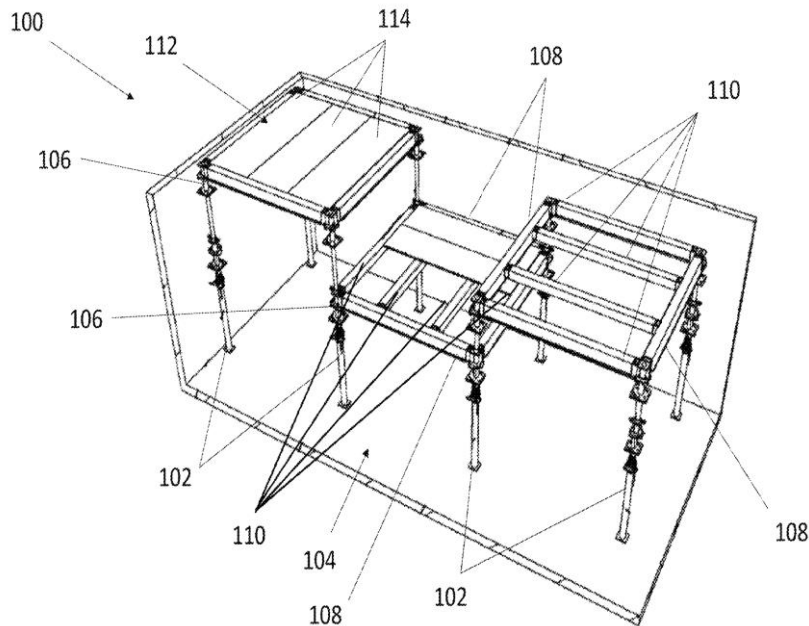


FIG. 1

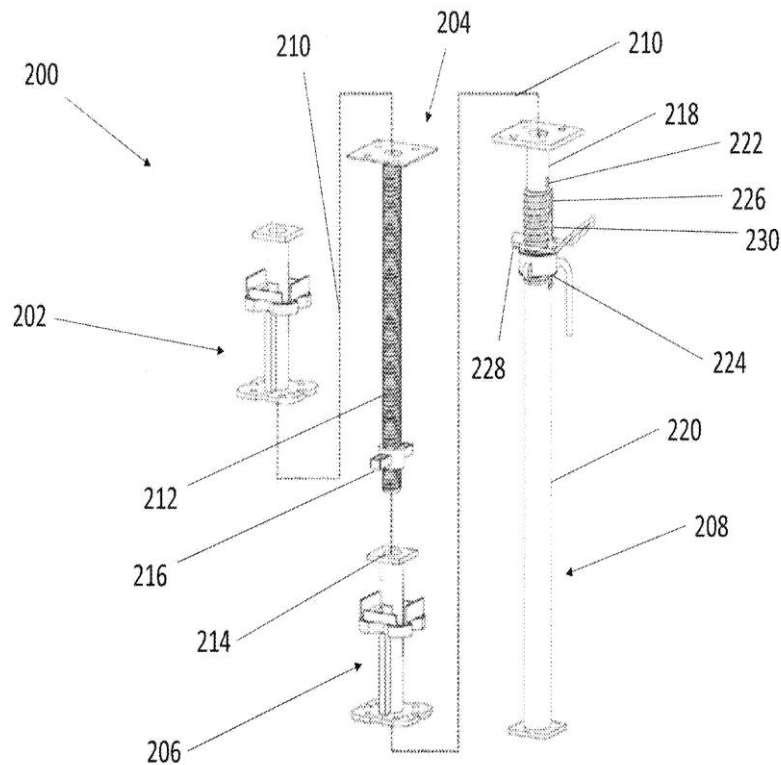


FIG. 2

37. Defendant's infringing device infringes the claims of the '069 Patent.
38. Defendant's infringing device is substantially equivalent to the '069 Patent.
39. On information and belief, CSS learned through one of its suppliers that Defendants ordered devices embodying the technology covered by the patent-in-suit to be manufactured in China and shipped to the United States.
40. On information and belief, at least one shipment of such devices was delivered to Defendants.
41. On information and belief, Defendants has been observed using such devices on a construction sites in Austin Texas.

42. Specifically, Defendants have been using the patented device on the Mueller District Garage II Project located in Austin, Texas.

43. As shown, Defendants are using the patented device on the Mueller District Garage II Project located in Austin, Texas:





44. On information and belief, the device that Defendants are using is substantially similar to the technology covered by the patent-in-suit.

INFRINGEMENT OF U.S. PATENT NO. 10,024,069

45. Plaintiff incorporates by reference each of the allegations above and further alleges as follows

46. On July 14, 2020, United States Patent No. 10,024,069 (the “‘069 Patent”) was duly and legally issued for an invention entitled “Construction Prop Assembly.” CSS-Houston is the patentee of the ‘069 Patent and CSS is the assignee. CSS holds all rights and interests in the ‘069 Patent.

47. CSS is the owner of the '069 Patent with full rights to recovery of damages and other remedies of infringement, including full rights to recover past and future damages.

48. Each claim of the '069 Patent is valid, enforceable, and patent eligible.

49. Within the United States, Defendants have offered for sale, sold, and used products that infringe the '069 Patent (i.e., that meet each element of at least one claim, both literally and equivalently) and continues to do so.

50. Within the United States, Defendants have offered for sale, sold, and used products that are substantially equivalent to the '069 Patent (i.e., that meet each element of at least one claim, both literally and equivalently) and continues to do so.

51. Defendants have additionally imported such infringing products into the United States and continues to do so.

52. Defendants have infringed and continue to infringe the '069 Patent by its use of covered shoring shafts having upper and lower support plates in its grid shoring systems and the manufacture, use, sale, incorporation and/or offer for sale of products that incorporate covered support plate assemblies for grid shoring systems at least in part.

53. Defendants are liable for its infringement of the '069 Patent pursuant to 35 U.S.C. § 271.

54. Defendants' acts of infringement have caused damage to the Plaintiff, and the Plaintiff is entitled to recover from Defendants (or any successor entity to Bond) the damages sustained by the Plaintiff as a result of Defendants' wrongful acts in an amount subject to proof at trial.

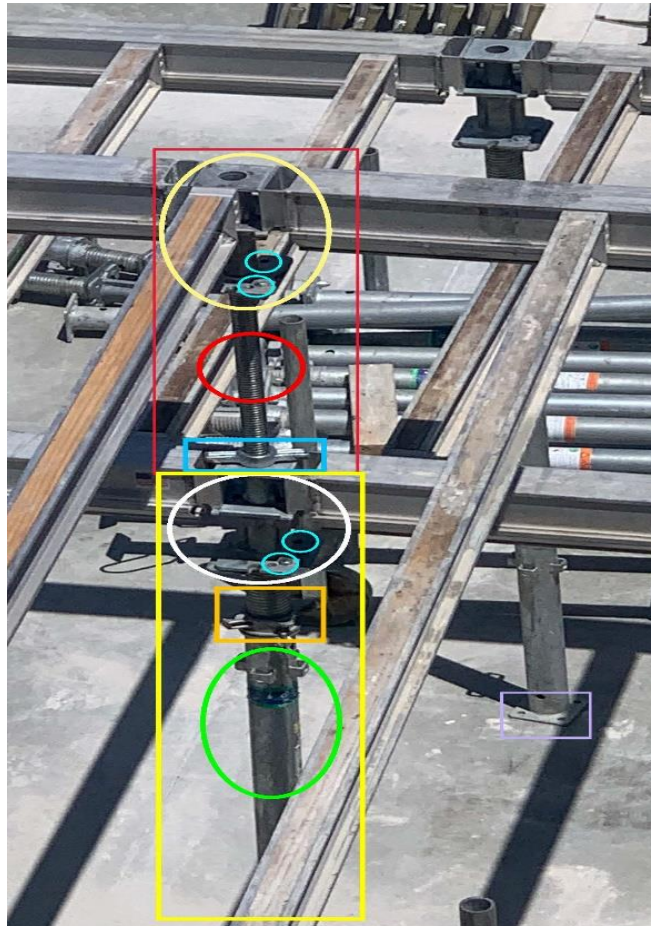
55. Defendants' infringement of the '069 Patent has been, and continues to be, willful and egregious.

56. Plaintiff has been damaged by Defendants' infringement and is entitled to reasonable damages and enhanced damages due to Defendants' willful infringement.

PATENT CLAIMS AND LIMITATIONS EMBODIED IN DEFENDANTS' PRODUCT

57. Plaintiff incorporates by reference each of the allegations above and further alleges as follows:

58. Defendants' product embodies each and every limitation of all of the claims set forth in Plaintiff's patent. By way of example, Plaintiff here lists the limitations related to Claim 1 (independent claim) and the limitations related to Claims 13, 14, and 15 (method claims).



CLAIM 1

59. Claim 1 of the '069 Patent states:

The invention claimed is:

1. An improved grid shoring system comprising:
 - one or more fixed beam-head prop assemblies supporting one or more beams;
 - each of said one or more fixed beam-head prop assemblies comprise an upper portion, a lower portion, a variable height, and a threaded collar;
 - said upper portion having a screw-jack threaded shaft assembly;
 - said screw-jack threaded shaft assembly comprises
 - a threaded shaft having an external diameter and an external threading and
 - an upper attachment plate having a plurality of fastening apertures;

said upper portion of said one or more fixed beam-head prop assemblies selectively slide into said lower portion of said one or more fixed beam-head prop assemblies;

said threaded collar comprises an internal threading and an internal diameter;

said internal threading of said threaded collar rotateably attaches to said external threading of said screw-jack threaded shaft assembly of said upper portion;

said lower portion comprises a lower central shaft having an internal diameter being larger than said external diameter of said threaded shaft;

said upper portion and said lower portion adjustably attach to one another by

- selectively sliding said threaded shaft in an up and down direction through said lower central shaft of said lower portion, and
- vertically adjusting said threaded collar along said threaded shaft to select said variable height;

said upper portion comprises a first end cap seat;

said lower portion comprises a second end cap seat;

said upper portion having a drop-head;

said drop-head comprises a bottom plate having a plurality of fastening apertures;

said screw-jack threaded shaft assembly attaches to said drop-head by

- aligning said plurality of fastening apertures of said bottom plate of said drop-head with said plurality of fastening apertures of said upper attachment plate of said screw-jack threaded shaft assembly, and
- inserting and locking one or more nut and bolt assemblies through said plurality of fastening apertures in said bottom plate and said upper attachment plate;

said first end cap seat is selectively attached to said drop-head of said upper portion;

said first end cap seat comprises a variable height;

adjusting said variable height of said first end cap seat comprises adjusting said threaded collar between said upper portion and said lower portion of said one or more fixed beam-head prop assemblies;

said lower portion comprising of a prop and a fixed beam-head;

said fixed beam-head comprising

- a central shaft having a central fixed beam-head aperture having an internal diameter, a first end and a second end,
- a bottom plate having a plurality of fastening apertures, and
- a second end cap seat attached around and to said central shaft;

said prop comprising

- a central shaft having a first end and a second end, and
- a prop top plate having a plurality of fastening apertures;

said central shaft of said prop comprises central prop aperture having a first end aperture and an internal diameter; and

said plurality of fastening apertures of said prop top plate of said prop align and attach to said plurality of fastening apertures of said bottom plate of said fixed beam-head.

60. The first limitation of Claim 1 states, “One or more fixed beam-head prop assemblies supporting one or more beams;”

61. Defendant’s accused product embodies this limitation of Plaintiff’s claim because the grid shoring system utilized by Defendants includes multiple prop assemblies supporting multiple beams. Defendants’ prop assemblies include a fixed beam-head (or an equivalent drop-head, or pass-through head, or other type of “beam-head” which embodies and accomplishes the same function).



62. The second limitation of Claim 1 states, “Each of said one or more fixed beam-head prop assemblies comprise an upper portion, a lower portion, a variable height, and a threaded collar;”

63. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ prop assemblies comprise an upper portion, a lower portion, a variable height, and a threaded collar. In the image below, the red rectangle denotes the upper portion of the prop assembly, the yellow rectangle denotes the lower portion of the prop assembly, the red circle inside

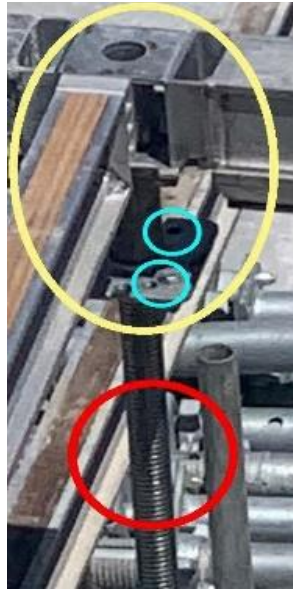
the red rectangle denotes a threaded shaft which allows for variable height, and the blue rectangle shows the threaded collar.



64. The third limitation of Claim 1 states, “Said upper portion having a screw-jack threaded shaft assembly;”

65. Defendants’ accused product embodies this limitation of Plaintiff’s claim because the upper portion of Defendants’ prop assemblies includes a screw-jack threaded shaft assembly

as shown in the images in the attached image. In the image below, the red circle shows the threaded shaft of the screw-jack threaded shaft assembly.



66. The fourth limitation of Claim 1 states, “Said screw-jack threaded shaft assembly comprises: a threaded shaft having an external diameter and an external threading”

67. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ prop assembly includes a threaded shaft having an external diameter and external threading as shown in the images above. The red circle denotes the external threading on the screw-jack threaded shaft.



68. The fifth limitation of Claim 1 states, “Said screw-jack threaded shaft assembly comprises: an upper attachment plate having a plurality of fastening apertures;”

69. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ screw-jack threaded shaft assembly includes an upper attachment plate which has a plurality of fastening apertures as apparent in the images above. Although the attachment plates themselves cannot be seen, the fastening apertures on the beam heads are visible and logic dictates that they must line up with fastening apertures on the attachment plates. The small teal circles in the image below show the fastening apertures on the beam heads which correspond to the fastening apertures on the attachment plates.



70. The sixth limitation of Claim 1 states, “Said upper portion of said one or more fixed beam-head prop assemblies selectively slide into said lower portion of said one or more fixed beam-head prop assemblies;”

71. Defendants’ accused product embodies this limitation of Plaintiff’s claim because the upper portion of Defendants’ prop assembly slides into the lower portion of the prop assembly as shown here.



72. The seventh limitation of Claim 1 states, “Said threaded collar comprises an internal threading and internal diameter;”

73. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ threaded collar includes internal threading and internal diameter. While these internal features cannot be seen visually in the photographs, the collar itself can be seen on the screw-jack threaded shaft which could only be accomplished with the internal diameter and internal threading. The blue rectangle in the image below shows the threaded collar affixed to the screw-jack threaded shaft assembly.



74. The eighth limitation of Claim 1 states, “Said internal threading of said threaded collar rotateably attaches to said external threading of said screw-jack threaded shaft assembly of said upper portion;”

75. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ threaded collar is attached to the external threading of the screw-jack shaft and logic and common sense dictate that the collar is rotateably attached to the screw-jack threaded shaft assembly as shown in the image above.

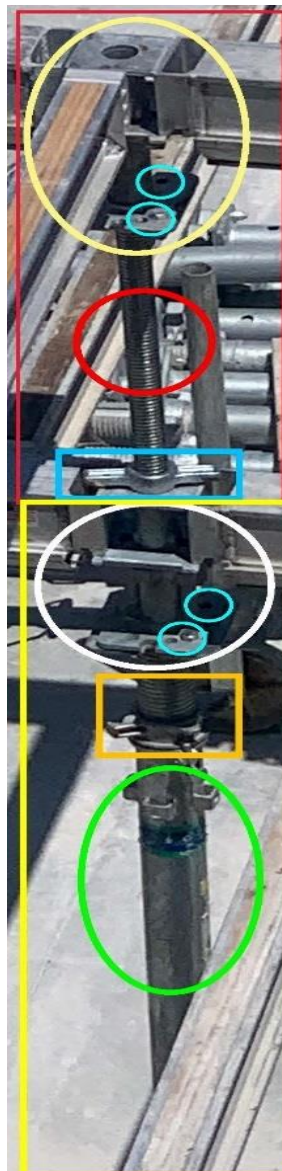
76. The ninth limitation of Claim 1 states, “Said lower portion comprises a lower central shaft having an internal diameter being larger than said external diameter of said threaded shaft;”

77. Defendants’ accused product embodies this limitation of Plaintiff’s claim because the lower portion of Defendants’ grid shoring assembly has an internal diameter that is larger than the external diameter of the threaded shaft. Although the inner diameter of the lower central shaft cannot be seen in the images, the threaded shaft of the prop can be seen inserted in the lower central shaft and logic and common sense dictate that the inner diameter must be larger than the threaded shaft. The orange rectangle in the image below denotes where the threaded shaft is inserted into the obviously larger central lower shaft.



78. The tenth limitation of Claim 1 states, “Said upper portion and said lower portion adjustably attach to one another by selectively sliding said threaded shaft in an up and down direction through said lower central shaft of said lower portion,”

79. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ threaded shaft slides into the lower central shaft in an up and down direction as shown in the image below. The threaded shaft can be seen inserted through the beam-head and into the central lower shaft and is supported by the threaded collar (blue rectangle).



80. The eleventh limitation of Claim 1 states, “Said upper portion and said lower portion adjustably attach to one another by vertically adjusting said threaded collar along said threaded shaft to select said variable height;”

81. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ threaded collar is vertically adjustable along the threaded shaft to select the variable height as shown in the image above.

82. The twelfth limitation of Claim 1 states, “Said upper portion comprises a first end cap seat;”

83. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ upper portion includes a first end cap seat as shown in the image below. The first end cap seat is the flanged portion of the beam-head component on which the ends of the support beams rest. The yellow oval shows the beam-head of the upper portion, the first end cap seat is not visible, however the beams can be seen resting on the first end cap seat.



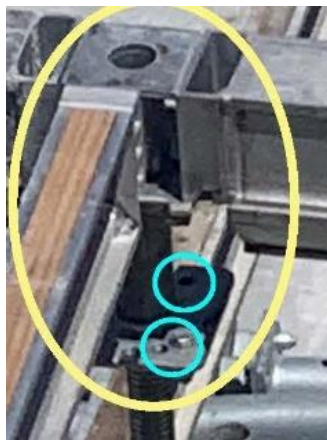
84. The thirteenth limitation of Claim 1 states, “Said lower portion comprises a second end cap seat;”

85. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' lower portion includes a second end cap seat as shown in the images above. The second end cap seat is the flanged portion of the beam-head component on which the lower (or second) set of support beams rest. The white circle shows the beam-head assembly of the lower portion, the second end cap seat can be seen clearly on the front side of the beam-head with beams resting on two of the other sides of the second end cap seat.



86. The fourteenth limitation of Claim 1 states, "Said upper portion having a drop-head;"

87. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' upper portion includes a drop-head (or an equivalent drop-head, or pass-through head, or other type of "beam-head" which embodies and accomplishes the same function) as shown in the images below. The yellow oval denotes the beam-head component on the upper portion of the prop assembly.



88. The fifteenth limitation of Claim 1 states, “Said drop-head comprises a bottom plate having a plurality of fastening apertures;”

89. Defendants’ accused product embodies this limitation of Plaintiff’s claim because the drop-head (or an equivalent pass-through head or other type of “beam-head” which embodies and accomplishes the same function) in Defendants’ shoring grid system includes a bottom plate with a plurality of fastening apertures as shown in the image above. The small teal circles within the yellow oval denote the fastening apertures on the bottom plate of the drop head.

90. The sixteenth limitation of Claim 1 states, “Said screw-jack threaded shaft assembly attaches to said drop-head by: aligning said plurality of fastening apertures of said bottom plate of said drop-head with said plurality of fastening apertures of said upper attachment plate of said screw-jack threaded shaft assembly,”

91. Defendants’ accused product embodies this limitation of Plaintiff’s claim because the bottom plate of Defendants’ drop-head (or an equivalent pass-through head or other type of “beam-head” which embodies and accomplishes the same function) is aligned with the attachment plate of Defendants’ screw-jack threaded shaft assembly as shown in the image below. The small teal circles within the yellow oval denote the fastening apertures of the bottom plate of the beam-head which are aligned with the upper attachment plate of Defendants’ screw-jack threaded shaft assembly.



92. The seventeenth limitation of Claim 1 states, “Said screw-jack threaded shaft assembly attaches to said drop-head by: inserting and locking one or more nut and bolt assemblies through said plurality of fastening apertures in said bottom plate and said upper attachment plate;”

93. Defendants’ accused product embodies this limitation of Plaintiff’s claim because nut and bolt assemblies are inserted and locked into the fastening apertures in Defendants’ drop-head (or an equivalent pass-through head or other type of “beam-head” which embodies and accomplishes the same function) bottom plate and the upper attachment plate as shown in the image above. The small teal circles within the yellow oval show the nut and bolt assemblies passing through the fastening apertures and holding the beam-head to the screw-jack threaded shaft upper attachment plate.

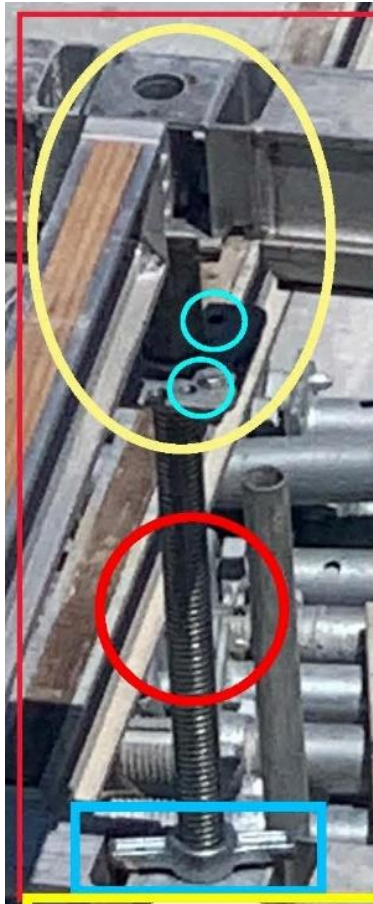
94. The eighteenth limitation of Claim 1 states, “Said first end cap seat is selectively attached to said drop-head of said upper portion;”

95. Defendants’ accused product embodies this limitation of Plaintiff’s claim because the first end cap seat is attached to the Defendants’ drop-head (or an equivalent pass-through head or other type of “beam-head” which embodies and accomplishes the same function) at the upper portion of the prop assembly as shown in the image below. The yellow oval denotes the beam-head and the first end cap is the component seen to be holding up the beams.



96. The nineteenth limitation of Claim 1 states, “Said first end cap seat comprises a variable height;”

97. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ first end cap seat allows for variable heights, as indicated by the threaded screw-jack shaft assembly seen in the image below. The red circle shows the presence of the threaded screw-jack shaft assembly which allows for variable height.



98. The twentieth limitation of Claim 1 states, “Adjusting said variable height of said first end cap seat comprises adjusting said threaded collar between said upper portion and said lower portion of said one or more fixed beam-head prop assemblies;”

99. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ first end cap seat is adjustable as indicated by the presence of the threaded collar seen between the upper and lower portions of the prop assemblies as shown in the image above. The red circle shows the threaded screw-jack shaft assembly. The blue rectangle denotes the threaded collar.

100. The twenty-first limitation of Claim 1 states, “Said lower portion comprising of a prop and a fixed beam-head;”

101. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' lower portion includes a prop and a fixed beam-head (or an equivalent drop-head, or pass-through head, or other type of "beam-head" which embodies and accomplishes the same function) as shown in the image below.



102. The twenty-second limitation of Claim 1 states, "Said fixed beam-head comprising: A central shaft having a central fixed beam-head aperture having an internal diameter, a first end and a second end,"

103. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' fixed beam-head (or an equivalent drop-head, or pass-through head, or other type of "beam-head" which embodies and accomplishes the same function) includes a central shaft having a central aperture with internal diameter (although not visible this aperture is apparent from the

fact that the thread screw-jack assembly passes through the internal diameter), a first end, and a second end as shown in the image below.



104. The twenty-third limitation of Claim 1 states, “Said fixed beam-head comprising: A bottom plate having a plurality of fastening apertures,”

105. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ fixed beam-head (or an equivalent drop-head, or pass-through head, or other type of “beam-head” which embodies and accomplishes the same function) includes a bottom plate with a plurality of fastening apertures as shown in the image below. The white circle shows the beam-head and the bottom plate with fastening apertures can be seen.



106. The twenty-fourth limitation of Claim 1 states, “Said fixed beam-head comprising: A second end cap seat attached around and to said central shaft;”

107. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ fixed beam-head (or an equivalent drop-head, or pass-through head, or other type of “beam-head” which embodies and accomplishes the same function) has a second end cap seat attached around and to the central shaft as shown in the image above. The white circle shows the beam-head and the second end cap seat can be seen on the front as well as on the sides where it is supporting beams.

108. The twenty-fifth limitation of Claim 1 states, “Said prop comprising: A central shaft having a first end and a second end,”

109. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ prop includes a central shaft with a first end and a second end as shown in the image below. The green oval denotes the prop assembly; the orange rectangle shows the first end of the prop; the purple rectangle to the right of the main prop assembly shows the second end of a different prop but implies the presence of a second end on all prop assemblies. (These can also be seen on the prop assemblies on the ground behind the shoring system in the original photograph above.)



110. The twenty-sixth limitation of Claim 1 states, “Said prop comprising: A prop top plate having a plurality of fastening apertures;”

111. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ prop top plate has a plurality of fastening apertures as shown in the image below. Inside the white circle, the top plate can be seen beneath the edges of the bottom plate of the beam-head.



112. The twenty-seventh limitation of Claim 1 states, “Said central shaft of said prop comprises central prop aperture having a first end aperture and an internal diameter;”

113. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' central shaft includes a central prop aperture with a first end aperture and an internal diameter. The orange rectangle in the image above denotes the first end aperture and, although the internal diameter cannot be seen visually, the threaded shaft inside it means that it must have an appropriate internal diameter.

114. The twenty-eighth limitation of Claim 1 states, "Said plurality of fastening apertures of said prop top plate of said prop align and attach to said plurality of fastening apertures of said bottom plate of said fixed beam-head."

115. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' prop top plate and the bottom plate of the fixed beam-head (or an equivalent drop-head, or pass-through head, or other type of "beam-head" which embodies and accomplishes the same function) are aligned and fastened with nut and bolt assemblies in the fastening apertures as shown in the image above. The small teal circles in the white circle denote the fastening apertures where the top plate of the prop and the bottom plate of the beam-head align.

116. In summary, based on the evidence above, Defendants have clearly infringed on the '069 patent by utilizing a grid shoring system that embodies each and every limitation of Claim 1.

CLAIM 13

117. Claim 13 of the '069 Patent states:

13. A method of using an improved grid shoring system, comprising:
supporting one or more beams on a first end cap seat and a second end cap seat of one or more fixed beam-head prop assemblies;
selectively adjusting a height of said first end cap seat by sliding a threaded shaft in an up and down direction through a lower central shaft of a lower portion, and vertically adjusting a threaded collar along said threaded shaft to select a variable height;
attaching a lower exterior portion of a prop to an upper interior portion comprises
aligning an external aperture of said lower exterior portion with a one of said plurality of side apertures, inserting a locking element through said external aperture and said one of said plurality of side apertures, and
locking a prop lock in place; wherein,
said lower portion comprises said prop having said lower exterior portion, said upper interior portion, and said prop lock; and
said one or more fixed beam-head prop assemblies comprise
said lower portion having a central fixed beam-head shaft,
an upper portion having said threaded shaft,
said threaded collar.

118. The first limitation of Claim 13 states, “Supporting one or more beams on a first end cap seat and a second end cap seat of one or more fixed beam-head prop assemblies;”

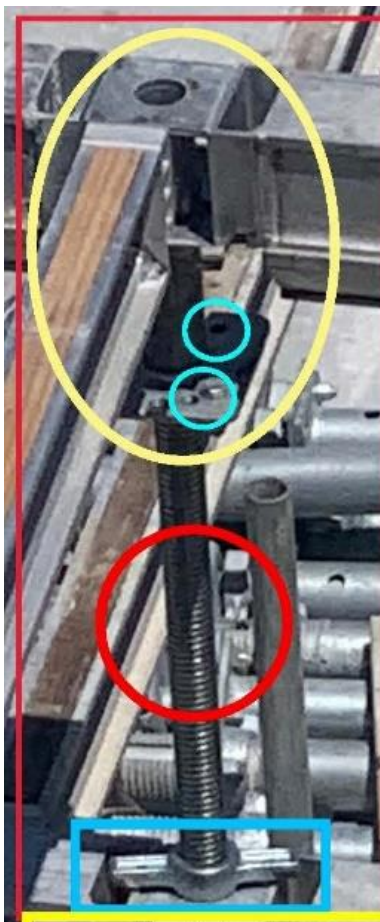
119. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ grid shoring system includes a method of supporting one or more beams on a first end cap seat and a second end cap seat on one or more prop assemblies as shown in the images below. The yellow oval shows multiple beams being supported on a first end cap seat of Defendants’ grid shoring system. The white circle shows additional beams supported on a second end cap seat. The third image below shows this configuration is being utilized on numerous prop assemblies.



120. The second limitation of Claim 13 states, “Selectively adjusting a height of said first end cap seat by: sliding a threaded shaft in an up and down direction through a lower central shaft of a lower portion,”

121. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ threaded shaft slides into the lower central shaft in an up and down direction in order

to adjust the height of the first end cap seat as shown in the image below. As previously stated, the blue rectangle denotes where the threaded shaft is inserted through the beam-head and into the central lower shaft and is supported by the threaded collar.



122. The third limitation of Claim 13 states, “Selectively adjusting a height of said first end cap seat by: vertically adjusting a threaded collar along said threaded shaft to select a variable height;”

123. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ threaded collar is vertically adjusted along the threaded shaft to select the variable height of the first end cap seat as shown in the image above. The blue rectangle denotes where the threaded collar is holding the variably height of the prop assembly.

124. The fourth limitation of Claim 13 states, “Attaching a lower exterior portion of a prop to an upper interior portion comprises: aligning an external aperture of said lower exterior portion with a one of said plurality of side apertures,”

125. On information and belief, Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ prop assembly requires aligning an external aperture with the side aperture of the interior portion of the prop as seen in the above images. Although the side aperture is difficult to see on the completed prop assembly, additional examples of this feature can be seen on the ground to the left of the completed assembly and clearly show the apertures described herein.



126. The fifth limitation of Claim 13 states, “Attaching a lower exterior portion of a prop to an upper interior portion comprises: inserting a locking element through said external aperture and said one of said plurality of side apertures,”

127. Defendants’ accused product embodies this limitation of Plaintiff’s claim because a locking element must be inserted through the side aperture of the shaft in order to guarantee that the prop assembly remains in place. The orange square shows the locking element (or an equivalent device that embodies and accomplishes the same function).



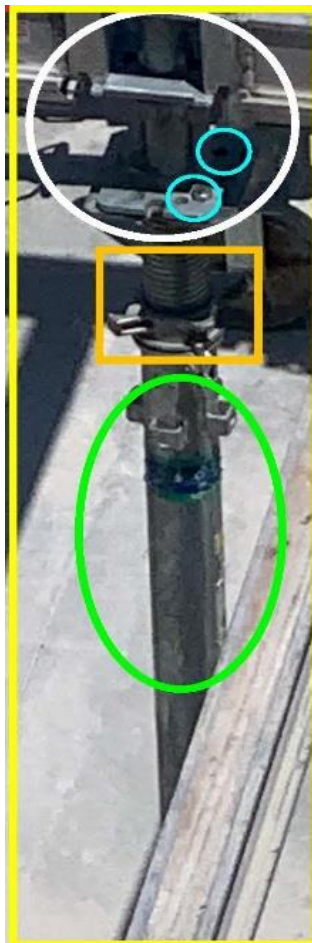
128. The sixth limitation of Claim 13 states, “Attaching a lower exterior portion of a prop to an upper interior portion comprises: locking a prop lock in place,”

129. On information and belief, Defendants’ accused product embodies this limitation of Plaintiff’s claim because a prop lock (or an equivalent device that embodies and performs the same function) is necessary to ensure the stability of the lower portion of Defendants’ prop assembly.

130. The seventh limitation of Claim 13 states, “Said lower portion comprises said prop having said lower exterior portion, said upper interior portion, and said prop lock;”

131. Defendants’ accused product embodies this limitation of Plaintiff’s claim because the lower portion of Defendants’ prop includes a lower exterior portion, an upper interior portion,

and a prop lock as seen in the above images. The green oval denotes the lower exterior portion of the prop assembly, the orange square shows the upper interior portion of the prop as well as the prop lock (or the equivalent device that embodies and accomplishes the same function) used by Defendants.



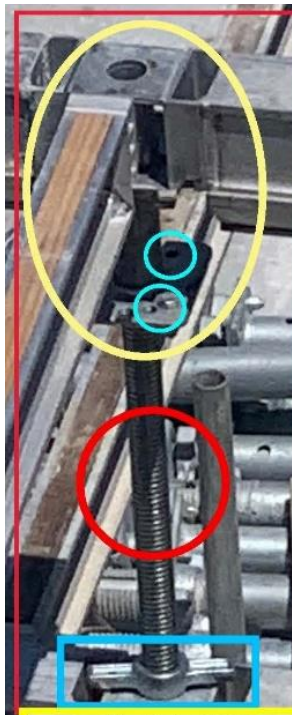
132. The eighth limitation of Claim 13 states, “Said one or more fixed beam-head prop assemblies comprise: said lower portion having a central fixed beam-head shaft,”

133. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ shoring system includes one or more prop assemblies with a lower portion having a fixed beam-head (or an equivalent drop-head, or pass-through head, or other type of “beam-head” which embodies and accomplishes the same function) with a central shaft as indicated below.



134. The ninth limitation of Claim 13 states, “Said one or more fixed beam-head prop assemblies comprise: an upper portion having said threaded shaft,”

135. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ shoring system includes one or more prop assemblies with an upper portion having a threaded shaft as indicated in the image below.



136. The tenth limitation of Claim 13 states, “Said one or more fixed beam-head prop assemblies comprise: a threaded collar.”

137. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' shoring system includes one or more prop assemblies with a threaded collar as indicated above. The blue rectangle shows the threaded collar.

138. In summary, based on the evidence above, Defendants have clearly infringed on the '069 patent by utilizing a grid shoring system that embodies each and every limitation of Claim 13.

CLAIM 14

139. Claim 14 of the '069 Patent states:

14. The method of using an improved grid shoring system of claim **13**, further comprising:
attaching a screw-jack threaded shaft assembly to a drop-head comprises:
aligning a plurality of fastening apertures of a bottom plate of said drop-head with a plurality of fastening apertures of an upper attachment plate of said screw-jack threaded shaft assembly, and
inserting and locking one or more nut and bolt assemblies through said plurality of fastening apertures in said bottom plate and said upper attachment plate;
and wherein,
said upper portion comprises said drop-head and said screw-jack threaded shaft assembly, and
said drop-head comprises said bottom plate having said plurality of fastening apertures.

140. The first limitation of Claim 14 states, "Attaching a screw-jack threaded shaft assembly to a drop-head comprises: aligning a plurality of fastening apertures of a bottom plate of said drop-head with a plurality of fastening apertures of an upper attachment plate of said screw-jack threaded shaft assembly,"

141. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' shoring system includes a drop-head (or an equivalent pass-through head or other type of "beam-head" which embodies and accomplishes the same function) component attached to a screw-jack threaded shaft assembly by aligning the fastening apertures of the bottom plate of the

beam-head with the fastening apertures of the upper attachment plate of the screw-jack threaded shaft as seen in the image below. The small teal circles in the yellow oval indicate where the fastening apertures of the bottom plate of the beam-head and upper attachment plate of the screw-jack threaded shaft assembly are aligned.

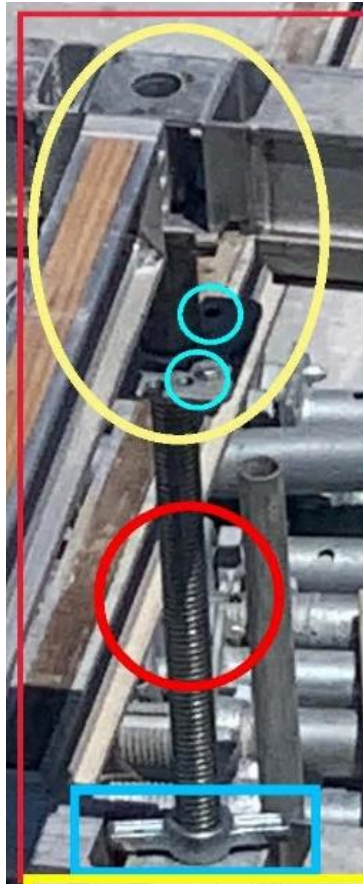


142. The second limitation of Claim 14 states, “Attaching a screw-jack threaded shaft assembly to a drop-head comprises: inserting and locking one or more nut and bolt assemblies through said plurality of fastening apertures in said bottom plate and said upper attachment plate;”

143. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ shoring system includes nut and bolt assemblies passed through the fastening apertures of the bottom plate of the drop-head (or an equivalent pass-through head or other type of “beam-head” which embodies and accomplishes the same function) and the upper attachment plate of the screw-jack threaded shaft assembly as seen in the above image. The small teal circles in the yellow oval indicate where the nut and bolt assemblies are inserted.

144. The third limitation of Claim 14 states, “And wherein, said upper portion comprises said drop-head and said screw-jack threaded shaft assembly,”

145. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' shoring system includes a drop-head (or an equivalent pass-through head or other type of "beam-head" which embodies and accomplishes the same function) and the screw-jack threaded shaft assembly as seen in the image below. The yellow oval shows the entire beam-head component and the red circle just below it shows the screw-jack threaded shaft assembly.



146. The fourth limitation of Claim 14 states, "Said drop-head comprises said bottom plate having said plurality of fastening apertures."

147. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' shoring system includes a drop-head (or an equivalent pass-through head or other type of "beam-head" which embodies and accomplishes the same function) component that has a plurality of fastening apertures as seen in the image below. The small teal circles in the yellow

oval denote the presence of the fastening apertures of the bottom plate of the beam-head component.



148. In summary, based on the evidence above, Defendants have clearly infringed on the '069 patent by utilizing a grid shoring system that embodies each and every limitation of Claim 14.

CLAIM 15

149. Claim 15 of the '069 Patent states:

15. The method of using an improved grid shoring system of claim 13, further comprising:

forming said improved grid shoring system with said one or more fixed beam-head prop assemblies by:
adjusting a height of each among said one or more fixed beam-head prop assemblies,

arranging said one or more fixed beam-head prop assemblies,

attaching said one or more fixed beam-head prop assemblies to one another with said one or more beams, and

attaching one or more panels to said one or more beams.

150. The first limitation of Claim 15 states, "Forming said improved grid shoring system with said one or more fixed beam-head prop assemblies by:"

151. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' shoring system includes multiple prop assemblies with fixed beam-heads (or an equivalent drop-head, or pass-through head, or other type of "beam-head" which embodies and accomplishes the same function) as seen in the image below.



152. The second limitation of Claim 15 states, "Adjusting a height of each among said one or more fixed beam-head prop assemblies,"

153. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' shoring system includes multiple prop assemblies each of which can be adjusted to a variety of heights as seen in the image above.

154. The third limitation of Claim 15 states, "Arranging said one or more fixed beam-head prop assemblies,"

155. Defendants' accused product embodies this limitation of Plaintiff's claim because Defendants' shoring system includes multiple prop assemblies with fixed beam-heads (or an

equivalent drop-head, or pass-through head, or other type of “beam-head” which embodies and accomplishes the same function) arranged according to the needs of the project as seen in the above image.

156. The fourth limitation of Claim 15 states, “Attaching said one or more fixed beam-head prop assemblies to one another with said one or more beams,”

157. Defendants’ accused product embodies this limitation of Plaintiff’s claim because Defendants’ shoring system includes multiple prop assemblies supporting a multitude of beams on fixed beam-heads (or an equivalent drop-head, or pass-through head, or other type of “beam-head” which embodies and accomplishes the same function) as seen in the above image.

158. The fifth limitation of Claim 15 states, “Attaching one or more panels to said one or more beams.”

159. On information and belief, Defendants’ accused product embodies this limitation of Plaintiff’s claim because the purpose of the grid shoring system utilized by Defendants is to allow for the pouring of concrete to create platforms and absent the panels, this would be impossible. While there are no panels erected in the images, logic and reason dictate that those components must be part of Defendants’ grid shoring system.

160. In summary, based on the evidence above, Defendants have clearly infringed on the ‘069 patent by utilizing a grid shoring system that embodies each and every limitation of Claim 15.

WILLFUL INFRINGEMENT

161. Plaintiff incorporates by reference each of the allegations above and further alleges as follows:

162. Bond's infringement of the '069 Patent is willful and deliberate, entitling the Plaintiff to increased damages under 35 U.S.C. § 284 and to attorneys' fees and costs incurred in prosecuting this action under 35 U.S.C. § 285.

163. Defendants were aware of CSS's ownership of the '069 Patent because Bond was the first named inventor, and knew the patent was assigned to CSS.

164. Defendants have infringed and continue to infringe the '069 Patent despite the objectively high likelihood that its actions constitute patent infringement.

JURY DEMAND

165. The Plaintiff demands a jury trial on all issues.

PRAYER FOR RELIEF

WHEREFORE, Plaintiff CONCRETE SUPPORT SYSTEMS, LLC prays for the following relief:

- a) A judgment in favor of Plaintiff that Defendants have infringed the '069 Patent and that the patent is valid, enforceable, and patent-eligible;
- b) A judgment and order requiring Defendants to pay Plaintiff compensatory damages, costs, expenses, and pre- and post-judgment interest for its infringement of the asserted patents, as provided under 35 U.S.C. § 284;
- c) A judgment that Defendants have willfully infringed the '069 Patent and that Plaintiff is entitled to enhanced damages as a result of such willful infringement;
- d) A permanent injunction prohibiting Defendants from further acts of infringement of the '069 Patent;
- e) A judgment and order requiring Defendants to provide an accounting and to pay supplemental damages to Plaintiff, including, without limitation, pre-judgment and post-judgment interest;

- f) A finding that this case is exceptional under 35 U.S.C. § 285, at minimum due to Defendants' willful infringement, and an award of Plaintiff reasonable attorney's fees and costs; and,
- g) Any and all other relief to which Plaintiff may be entitled.

Dated this 2nd day of February 2021.

Respectfully submitted,

By: /s/ Gabriel A. Assaad
Gabriel A. Assaad
Texas Bar No. 24076189
gassaad@mcdonaldworley.com
Matthew S. Yeziarski
Texas Bar No. 24076989
matt@mcdonaldworley.com
McDonald Worley, PC
1770 St. James St., Suite 100
Houston, TX 77056
(713) 523-5500 – telephone
(713) 523-5501 – facsimile

ATTORNEYS FOR PLAINTIFF

CERTIFICATE OF SERVICE

I hereby certify on February 2, 2021, I electronically filed the foregoing pleading with the Clerk of the Court by using the CM/ECF system, which will send a notice of electronic filing to the following counsel of record in this matter:

Michael J. Collins
MAIER & MAIER, PLLC
2777 Allen Parkway, Suite 1000
Houston, TX 77019
Telephone: (713)452-2620
Facsimile: (703) 991-7071
mjc@maierandmaier.com

/s/ Gabriel A. Assaad
Gabriel A. Assaad