IN THE UNITED STATES DISTRICT COURT
FOR THE WESTERN DISTRICT OF TEXAS
WACO DIVISION

DALI WIRELESS, INC., Plaintiff, v. CELLCO PARTNERSHIP D/B/A VERIZON WIRELESS, VERIZON CORPORATE SERVICES GROUP INC., VERIZON ONLINE LLC, COMMSCOPE HOLDING COMPANY, INC., COMMSCOPE, INC., COMMSCOPE TECHNOLOGIES LLC, ERICSSON INC., TELEFONAKTIEBOLAGET LM ERICSSON, CORNING INC., and CORNING OPTICAL COMMUNICATIONS LLC, Defendants.	)	Case No. 6:22-CV-00104-ADA **JURY TRIAL DEMANDED**

PLAINTIFF'S PRELIMINARY INFRINGEMENT CONTENTIONS TO DEFENDANTS COMMSCOPE HOLDING COMPANY, INC., COMMSCOPE, INC., AND COMMSCOPE TECHNOLOGIES LLC

Plaintiff Dali Wireless, Inc. ("Dali") hereby provides its Preliminary Infringement Contentions to Defendants CommScope Holding Company, Inc., CommScope, Inc., CommScope Technologies LLC (collectively, "CommScope") as to U.S. Patent Nos. 11,026,232 (the "'232 Patent") and 10,334,499 (the "'499 Patent") (collectively, "the Asserted Patents"). This disclosure is without any concession, agreement, admission or waiver of any ultimate determination of relevance, admissibility or discoverability of particular information for any purpose, and without waiver of any attorney-client, work product or other privilege or immunity. Dali makes this disclosure based on its present information, without the benefit of discovery. Moreover, to the extent the Court construes the claims of any of the asserted patents, additional arguments and/or

information may be relevant in light of any such construction. Dali, therefore, reserves the right to supplement and/or amend this disclosure at any time in view of the Court's construction, in view of any new information learned during fact and expert discovery, or for any other reason permissible under the Federal and Local Rules.

The Preliminary Infringement Contentions attached as Exhibits A and B hereto are based on information presently available to Dali. Based upon that information, the attached Contentions include claim charts that show that CommScope's ION®-E/ERA infringes one or more claims of the Asserted Patents either literally or under the doctrine of equivalents.

Dali presently asserts that the priority dates for all asserted claims of the '232 Patent and '499 Patent are those reflected on the face of the patents—*i.e.*, September 14, 2010 and February 7, 2011, respectively. To the extent that the dates of Dali's conception and reduction to practice becomes a relevant disputed issue, Dali reserves the right to supplement and/or amend this disclosure at any time in view of the Court's construction, in view of any new information learned during fact and expert discovery, or for any other reason permissible under the Federal and Local Rules.

Pursuant to the Court's Order Governing Proceedings, Dali will produce today copies of any non-privileged documents relating to Dali's conception and reduction to practice of the inventions claimed in the '232 and '499 Patents of which Dali is presently aware, including copies of the '232 and '499 Patents' file histories.

Date: June 10, 2022

Respectfully submitted,

/s/ Cristofer Leffler

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CERTIFICATE OF SERVICE

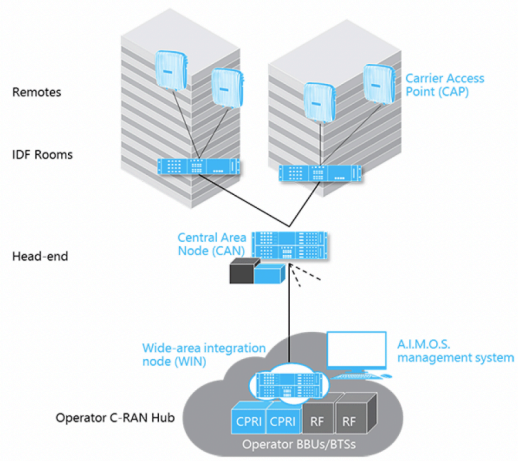
The undersigned counsel hereby certifies that on June 10, 2022, a true and correct copy of the foregoing was served on all counsel of record via email.

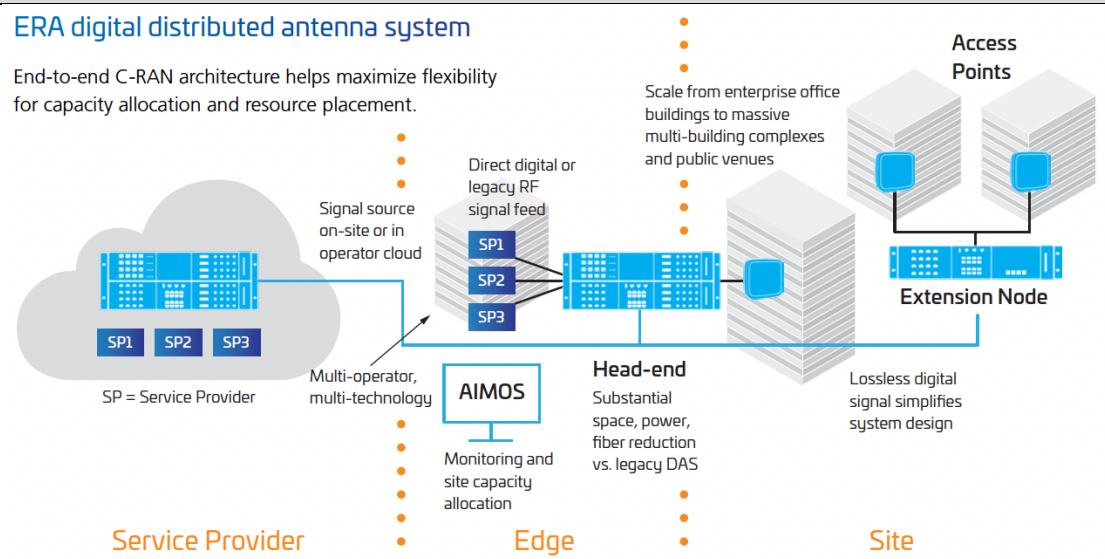
s/*Cristofer Leffler*
Cristofer Leffler

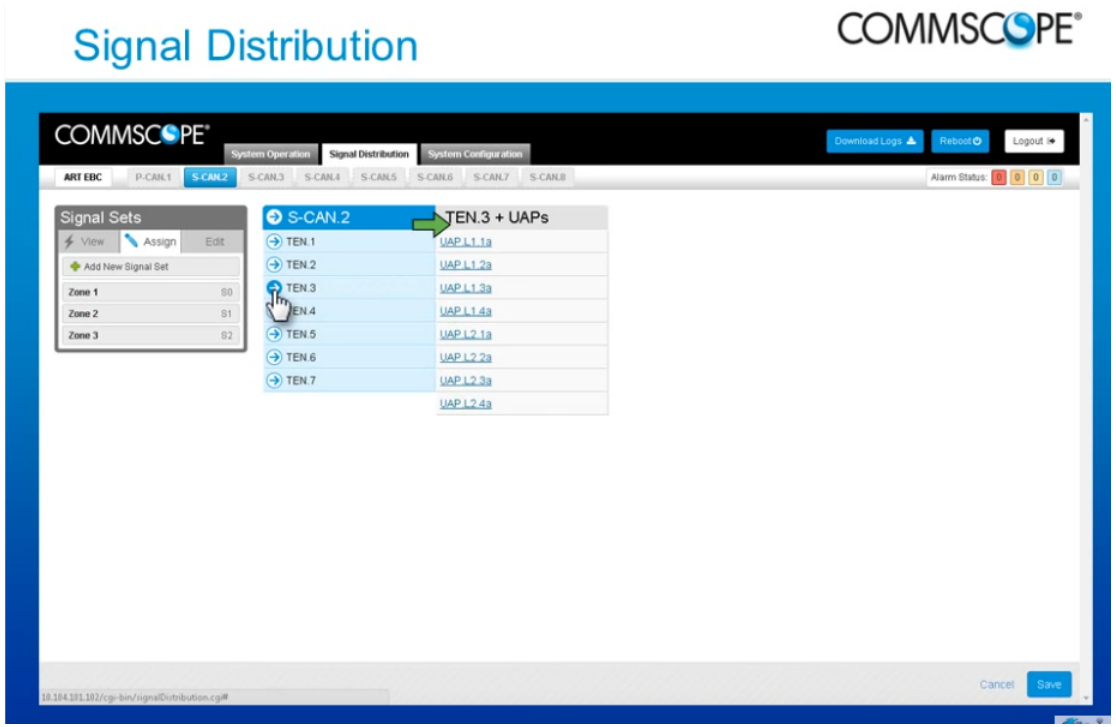
Exhibit A

Plaintiff Dali Wireless Inc. ("Dali") contends that Defendants Cellco Partnership D/B/A Verizon Wireless, Verizon Corporate Services Group Inc., Verizon Online LLC (collectively, "Verizon"), CommScope Holding Company, Inc., CommScope Inc., and CommScope Technologies LLC (collectively, "CommScope") (altogether "Verizon / CommScope") infringe the below-identified claims of Dali's U.S. Patent No. 11,026,232 (the '232 Patent) by deploying, operating, maintaining, testing, and using Verizon's LTE and 5G networks which include equipment relating to solutions for in-building wireless coverage, such as CommScope's ION-E/ERA platform (including but not limited to Wide-Area Integration Node (WIN), Central Area Nodes (CAN), Transport Extension Nodes (TEN), Carrier Access Points (CAP), Universal Access Points (UAP), cabling and switches, antennas, various interface modules and donor cards, and any software running thereon) (collectively, "Verizon / CommScope Accused Instrumentalities"). The specific components, systems, and constructs identified in this chart are for exemplary purposes only and Dali reserves all rights to supplement as additional components, systems, and constructs become known through discovery, as well as after Verizon / CommScope produces documents and source code and/or the Court construes any terms from the claims of the '232 Patent. Claims 1-3, 6-8, 12-14, 16-18, and 20 are infringed under 35 U.S.C. § 271(a) when Verizon / CommScope uses the Verizon / CommScope Accused Instrumentalities.

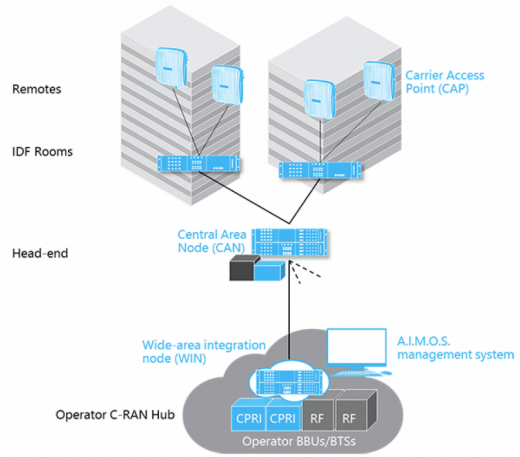
Claim 1 – Element	Verizon / CommScope's Infringement
[PREAMBLE] A wireless system comprising:	To the extent the preamble is interpreted to be limiting, the Verizon / CommScope Accused Instrumentalities satisfies this preamble. On information and belief, and based on publicly available information, the Verizon / CommScope Accused Instrumentalities satisfy each and every limitation of claim 1 by providing a wireless system as detailed here.
[ELEMENT 1-A] one or more central nodes that receive a number of a plurality of radio resources from an operator hub that enables wireless communications and that provides the plurality of	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes one or more central nodes that receive a number of a plurality of radio resources from an operator hub that enables wireless communications and that provides the plurality of radio resources to a radio access network using the Common Public Radio Interface (CPRI) protocol.

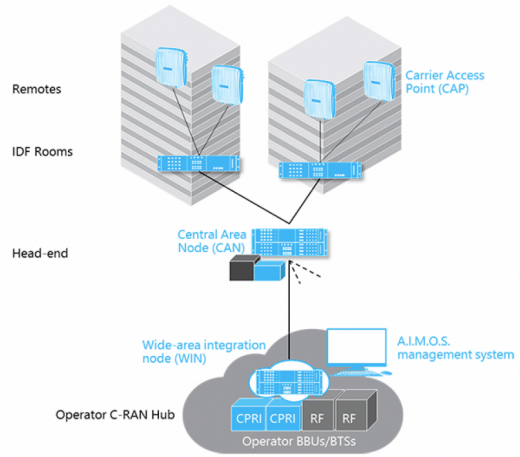
Claim 1 – Element	Verizon / CommScope's Infringement
radio resources to a radio access network using the Common Public Radio Interface (CPRI) protocol; and	For example, CommScope's ION-E/ERA platform includes a Central Area Node ("CAN") "located at the campus or building head-end. It digitizes baseband RF signals, combines signals from different operators and distributes them throughout a building or campus." *See, e.g.*, DALIVZN-000429. For example, CommScope's ION-E/ERA platform includes a "CPRI digital donor (CDD)" that "receives CPRI digital signals from compatible operator baseband units (BBU)." *See, e.g.*, *Id*. CommScope's ION-E/ERA platform also includes a "RF donor card (RFD) [that] receives analog RF signals from operator base transceiver stations (BTS)." *Id*. CommScope's ION-E/ERA platform's CAN receives radio resources from an operator hub: **ERA and ION-E** ERA is an extension of the hardware and software architecture that CommScope originally introduced as ION-E. Going forward, all new systems are ERA. Since ION-E and ERA share the same hardware modules, system software and management systems, existing ION-E systems can be updated and expanded using ERA components.  DALIVZN-000428.

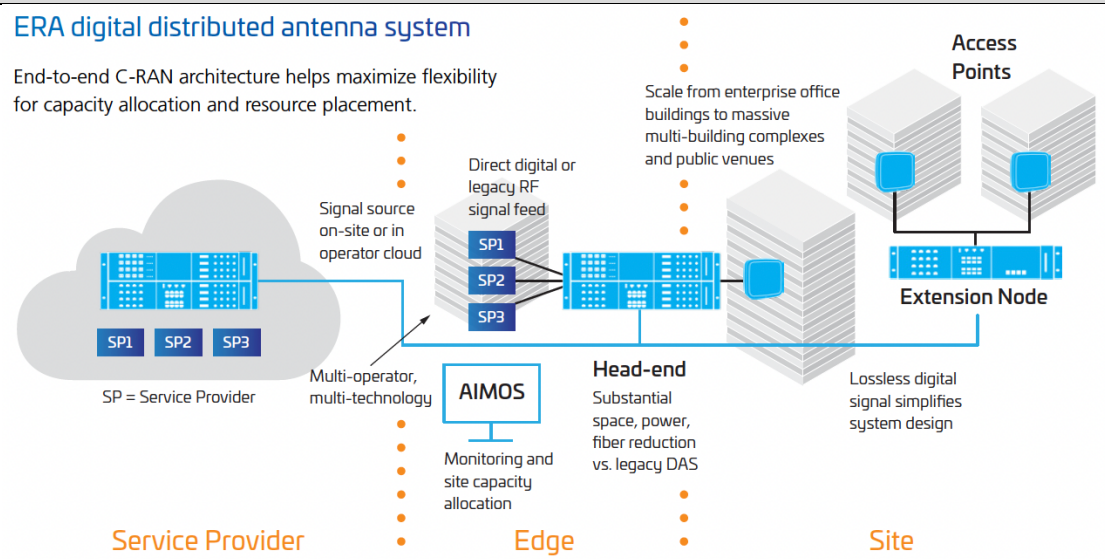
Claim 1 – Element	Verizon / CommScope's Infringement
	 DALIVZN-000423. Further, CommScope's ION-E/ERA platform includes a central node (CAN) that can send digital representations of a first set of downlink radio resources to a first remote radio unit (CAP or UAP) at a first point in time, including through the TEN for transmission at an antenna of the first remote radio unit (CAP or UAP). Specifically, CommScope's ION-E/ERA platform comprises software that allows for the creation of signal sets that are customized sets of radio resources. Multiple signal sets from different base stations can be created and assigned to either a remote access point (CAP or UAP) or a TEN. According to a webinar introduction to ION-E: "[W]e can send any signals to any of the UAPs. … The UAP can have only one assigned signal set. So we create signal sets from Zone 3, Zone 2 and Zone 1, and the signals that … comprise[ ] the signal sets are different based on these operators. So this would be the way we do that. We, for example, create a new signal set called Zone 1 and then select which channels go to … that signal set.

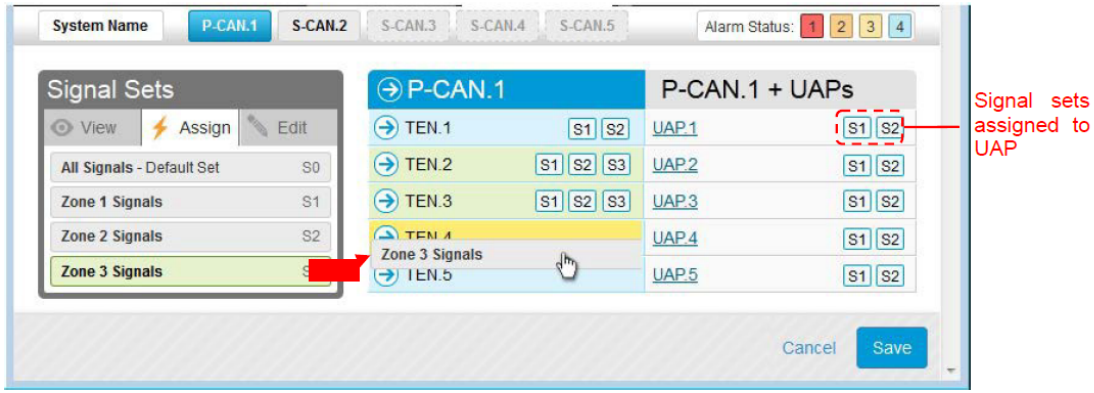
Claim 1 – Element	Verizon / CommScope's Infringement
	And we do Zone 2 and Zone 3. So we can have the same sectors, same signals in multiple signal sets but only one signal set can go to any of the UAPs. You can either send the Zone 1, Zone 2, Zone 3 signal set … directly to a TEN, then it will be automatically be distributed to all of the UAPs that are connected to that TEN. This is probably how you would do that in most cases where you have a zone driven by a TEN." *See, e.g.*, Webinar Introduction to ION-E, Telecom Knowledge Share, Published July 22, 2016, available at https://www.youtube.com/watch?v=Kmw2qMlgLrU ("Webinar Introduction to ION E") at 22:00-22:49, last accessed June 8, 2022.  *Id.* CommScope's ION-E/ERA platform's CAN includes a CPRI interface:

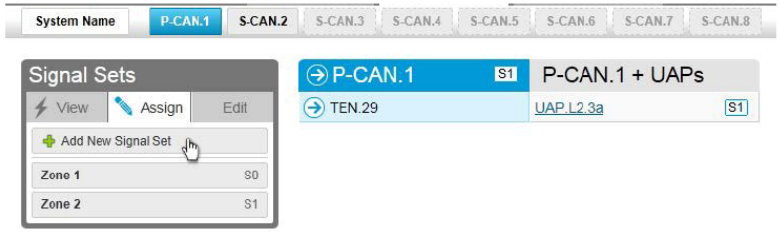
Claim 1 – Element	Verizon / CommScope's Infringement
	• **The consolidated head-end requires less equipment.** Since its Common Public Radio Interface (CPRI) baseband interface eliminates the need for radio-freqency (RF) hardware and interfaces—taking up less space and less operational budget. DALIVZN-000635.
[ELEMENT 1-B] a plurality of wireless access points that is coupled to the one or more central nodes and distributes one or more wireless signals to one or more wireless subscribers, the plurality of wireless access points including at least a first access point and a second access point,	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a plurality of wireless access points that is coupled to the one or more central nodes and distributes one or more wireless signals to one or more wireless subscribers, the plurality of wireless access points including at least a first access point and a second access point. For example, CommScope's ION-E/ERA platform includes "[a] range of remote access points that convert the digital signal back to radio frequency (RF) for over-the-air transmission." These wireless access points include "the carrier access point (CAP)" and "the universal access point (UAP)." *See, e.g.*, DALIVZN-000429. The central nodes distribute wireless signals to the wireless access points. For example, CommScope's ION-E/ERA platform includes a Central Area Node ("CAN") "located at the campus or building head-end. It digitizes baseband RF signals, combines signals from different operators and distributes them throughout a building or campus." *See, e.g.*, DALIVZN-000429.

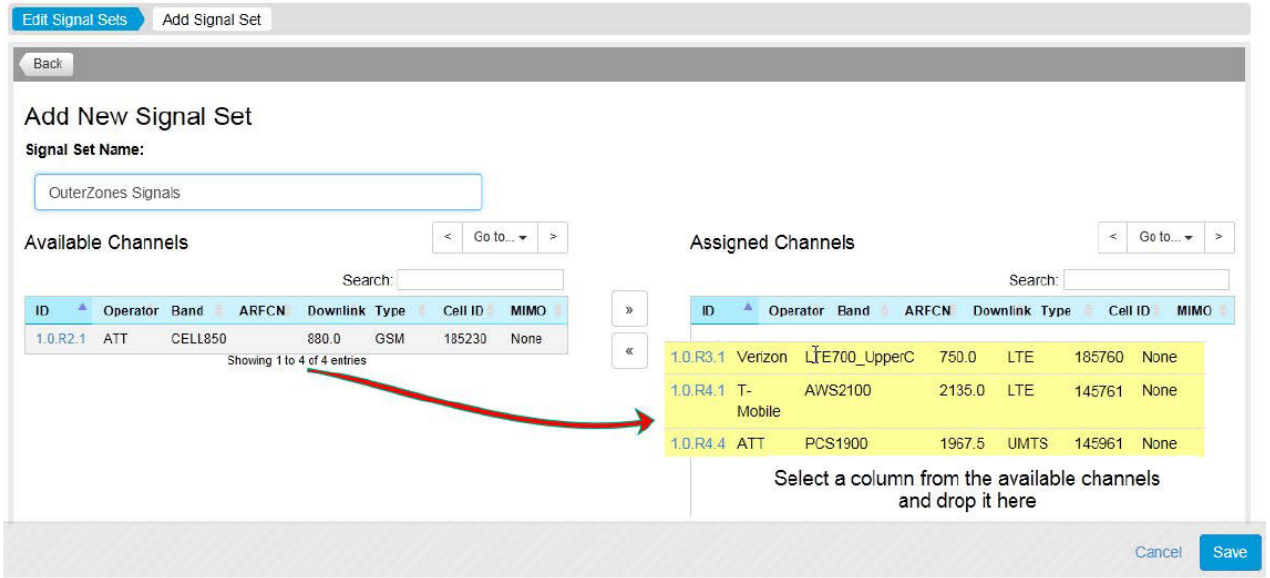
Claim 1 – Element	Verizon / CommScope's Infringement
	ERA and ION-E ERA is an extension of the hardware and software architecture that CommScope originally introduced as ION-E. Going forward, all new systems are ERA. Since ION-E and ERA share the same hardware modules, system software and management systems, existing ION-E systems can be updated and expanded using ERA components.  DALIVZN-000428.

Claim 1 – Element	Verizon / CommScope's Infringement
	ERA and ION-E ERA is an extension of the hardware and software architecture that CommScope originally introduced as ION-E. Going forward, all new systems are ERA. Since ION-E and ERA share the same hardware modules, system software and management systems, existing ION-E systems can be updated and expanded using ERA components.  DALIVZN-000428.

Claim 1 – Element	Verizon / CommScope's Infringement
	 DALIVZN-000423.
[ELEMENT 1-C] wherein one or more central nodes assigns a first subset of the number of the plurality of radio resources to the first access point and a second subset of the number of the plurality of radio resources to the second access point, the first subset including more radio resources than the second subset, and	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes the one or more central nodes recited in claim **Element 1-A**, wherein one or more central nodes assigns a first subset of the number of the plurality of radio resources to the first access point and a second subset of the number of the plurality of radio resources to the second access point, the first subset including more radio resources than the second subset. For example, CommScope's ION-E/ERA platform includes a baseband unit (CAN) that can assign assigns a first subset of the number of the plurality of radio resources to a first access point (CAP or UAP) and a second subset of the number of the plurality of radio resources to a second access point (CAP or UAP). The first subset of radio resources can include more radio resources than the second subset.

Claim 1 – Element	Verizon / CommScope's Infringement
	According to a CommScope webinar, "[w]e have a full control over each channel, we can turn channels on and off…and we can distribute the channels to any UAP with extreme flexibility, so any signal can go to any UAP… We create signal sets and then those signal sets can be sent via software or software command to them, to any UAP." Webinar Introduction to ION-E, Telecom Knowledge Share, Published July 22, 2016, available at https://www.youtube.com/watch?v=Kmw2qMlgLrU ("Webinar Introduction to ION E") at 22:21-22:48, last accessed June 8, 2022. In addition, multiple signal sets from different base stations can be created and assigned to remote access points: **Assign Signal Sets (Direct signal traffic to TENs and UAPs)** Signal Sets, which are a user-defined set of channels, can be quickly assigned to CANs and all UAPs assigned to them, TENs and all UAPs assigned to them, or to individual UAPs on the *Signal Distribution* page. 1. Click on the *Signal Distribution* tab to open the page. 2. Assign a signal set by: ○ Clicking on a signal set and dragging it onto the a TEN or UAP (set icons adjacent to the device name indicate the sets assigned to a TEN or UAP) ○ Clicking on a signal set to select it (green highlight) and then clicking on each TEN or UAP to which you wish to assign the signal set.  3. Click the *Save* button after you've assigned each signal set DALIVZN-000465.

Claim 1 – Element	Verizon / CommScope's Infringement
	5.5. Signal Distribution The ION-E uses signal sets to group the detected signals to simplify signal routing to the radiating elements throughout the system. First the user must create and define the signal sets by assigning channels to the sets. The signal sets are then assigned as needed using drag and drop functionality to route the signals to the TENs and UAPs. **Create and Edit Signal Sets** 1. Click on the *Signal Distribution* tab to open the page. 2. Select a set from the *Signal Sets* list and click the *Edit* button to edit an existing set. 3. Click on the *Add a New Signal Set* link to open the Add *Signal Set* page to create a new set.  4. Enter a Name for the signal set in the *Signal Set Name* field. 5. Click to select a channel from the *Available Channels* list or shift click to select multiple channels and drag them onto the *Assigned Channels* list.

Claim 1 – Element	Verizon / CommScope's Infringement
	 6. Click the *Save* button to save the Signal Set. DALIVZN-000464-465. Further, CommScope's Era System "is an extension of the hardware and software architecture that CommScope originally introduced as ION-E" such that "ION-E and Era share the same hardware modules, system software and management systems" and "existing ION-E systems can be updated and expanded using Era components." See, e.g., DALIVZN-000428.
[ELEMENT 1-D] wherein, in response to a change in need of a number of wireless subscribers coupled to the second access point and which of the second subset is loaded	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes the one or more central nodes recited in claim **Element 1-A**, wherein, in response to a change in need of a number of wireless subscribers coupled to the second access point and which of the second subset is loaded beyond a threshold, the one or more central nodes assign additional radio resources of the plurality of radio resources to the second access point.

Claim 1 – Element	Verizon / CommScope's Infringement
beyond a threshold, the one or more central nodes assign additional radio resources of the plurality of radio resources to the second access point.	The Era System further provides for dynamic "capacity routing" which, on information and belief, dynamically changes the amount of radio resources between the first set of radio resources and a second set of radio resources. • **Capacity can be dynamically shared across many buildings.** The solution adjusts levels to meet variable demand, thanks to its capacity routing capabilities. DALIVZN-000635. Further, CommScope's ION-E/ERA platform is described as "Flexible . . . Shift capacity to where and when you need it, all in software." *See, e.g.*, DALIVZN-000421. CommScope's Era System "is an extension of the hardware and software architecture that CommScope originally introduced as ION-E" such that "ION-E and Era share the same hardware modules, system software and management systems" and "existing ION-E systems can be updated and expanded using Era components." See, e.g., DALIVZN-000428. An Era C-RAN antenna system product marketing video published by CommScope further explains that: "The system adapts to user movements. For example, between university classrooms in the daytime and residences at night. Any RF input can go into any port, so there is no need for cumbersome source-to-port mapping and remapping. When sectorization changes are needed, sectors can be remapped to different coverage areas remotely through a drag-and-drop web interface, without site visits or manual rewiring." *See* CommScope Era C-RAN Antenna System, CommScope, published February 12, 2018, available at https://youtu.be/uBRDL7a8_8g ("Era C-RAN Marketing Video") at 1:27-1:54, last accessed June 8, 2022.

Claim 1 – Element	Verizon / CommScope's Infringement
	CommScope's ION-E/ERA platform also allows the system to "[a]djust capacity across the network by sector or channel through a web-based drag-and-drop interface." *See, e.g.*, DALIVZN-000428. CommScope also states that "as usage patterns change, capacity can be re-allocated through a web-based drag and drop software GUI rather than physical re-wiring." *See, e.g.*, DALIVZN-000429.

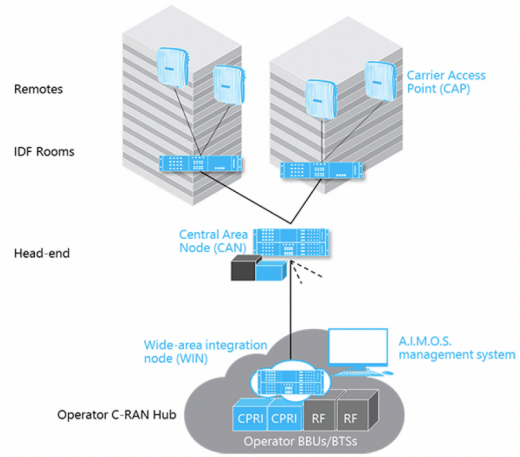
Claim 2	Verizon / CommScope's Infringement
The wireless system of claim 1, wherein the change in need is determined based on a change in capacity needed by the number of wireless subscribers coupled to the second access point or a change in throughput needed by the number of wireless subscribers coupled to the second access point.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the wireless system of claim 1, wherein the change in need is determined based on a change in capacity needed by the number of wireless subscribers coupled to the second access point or a change in throughput needed by the number of wireless subscribers coupled to the second access point. *See* **Claim Element 1-C** and **Element 1-D**.

Claim 3	Verizon / CommScope's Infringement
The wireless system of claim 1, wherein the additional resources are included in the first subset prior to being assigned to the second access point, and wherein the one or more central nodes assign	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the wireless system of claim 1, wherein the additional resources are included in the first subset prior to being assigned to the second access point, and wherein the one or more central nodes assign the additional radio resources of the plurality of radio resources to the second access point comprises removing the additional resources from the first subset assigned to the first access point. *See* **Claim Element 1-C** and **Element 1-D**.

Claim 3	Verizon / CommScope's Infringement
the additional radio resources of the plurality of radio resources to the second access point comprises removing the additional resources from the first subset assigned to the first access point.	

Claim 6	Verizon / CommScope's Infringement
The wireless system of claim 1, wherein the first access point belongs to a first sector and the second access point belongs to a second sector.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the wireless system of claim 1, wherein the first access point belongs to a first sector and the second access point belongs to a second sector. *See* **Claim Element 1-C**; *see also, e.g.*, DALIVZN-000428 ("Adjust capacity across the network by sector or channel through a web-based drag-and-drop interface").

Claim 7	Verizon / CommScope's Infringement
The wireless system of claim 1, wherein the first access point belongs to a first building and the second access point belongs to a second building.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the wireless system of claim 1, wherein the first access point belongs to a first building and the second access point belongs to a second building.

Claim 7	Verizon / CommScope's Infringement
	ERA and ION-E ERA is an extension of the hardware and software architecture that CommScope originally introduced as ION-E. Going forward, all new systems are ERA. Since ION-E and ERA share the same hardware modules, system software and management systems, existing ION-E systems can be updated and expanded using ERA components.  DALIVZN-000428.

Claim 8- Element	Verizon / CommScope's Infringement
The wireless system of claim 1, wherein at least one of the plurality of wireless access points enables communication between an IP device and the one or more central nodes.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the wireless system of claim 1, wherein at least one of the plurality of wireless access points enables communication between an IP device and the one or more central nodes. *See* **Claim Element 1-B**.

Claim 12 – Element	Verizon / CommScope's Infringement
[PREAMBLE] A method comprising:	To the extent the preamble is interpreted to be limiting, the Verizon / CommScope Accused Instrumentalities satisfies this preamble. On information and belief, and based on publicly available information, the Verizon / CommScope Accused Instrumentalities satisfy each and every limitation of claim 12 by performing the method of claim 12 as detailed here. *See* **Claim 1**. Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.
[ELEMENT 12-A] receiving a plurality of radio resources from an operator hub that operates using a Common Public Radio Interface (CPRI) protocol;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform receives a plurality of radio resources from an operator hub that operates using a Common Public Radio Interface (CPRI) protocol. *See* **Claim Element 1-A**.
[ELEMENT 12-B] assigning a first subset of the plurality of radio resources to a first access point included in a plurality of wireless access points and a second subset of the plurality of radio resources to a second access point included in the plurality of wireless access points, the	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform assigns a first subset of the plurality of radio resources to a first access point included in a plurality of wireless access points and a second subset of the plurality of radio resources to a second access point included in the plurality of wireless access points, the first subset including more radio resources than the second subset. *See* **Claim Element 1-C**.

Claim 12 – Element	Verizon / CommScope's Infringement
first subset including more radio resources than the second subset; and	
[ELEMENT 12-C] in response to a change in need of a number of wireless subscribers coupled to the second access point and which of the second subset is loaded beyond a threshold, assigning one or more additional radio resources of the plurality of radio resources to the second access point.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform in response to a change in need of a number of wireless subscribers coupled to the second access point and which of the second subset is loaded beyond a threshold, assigns one or more additional radio resources of the plurality of radio resources to the second access point. *See* **Claim Element 1-D**.

Claim 13	Verizon / CommScope's Infringement
The method of claim 12, wherein the change in need is determined based on a change in capacity needed by the number of wireless subscribers coupled to the second access point or a change in throughput needed by the number of wireless subscribers coupled to the second access point.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform performs the method of claim 12, wherein the change in need is determined based on a change in capacity needed by the number of wireless subscribers coupled to the second access point or a change in throughput needed by the number of wireless subscribers coupled to the second access point. *See* **Claim Element 1-D**. Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.

Claim 14	Verizon / CommScope's Infringement
The method of claim 12, wherein the one or more additional resources are included in the first subset prior to being assigned to the second access point, and wherein assigning the one or more additional radio resources comprises removing the one or more additional resources from the first subset assigned to the first access point.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform performs the method of claim 12, wherein the one or more additional resources are included in the first subset prior to being assigned to the second access point, and wherein assigning the one or more additional radio resources comprises removing the one or more additional resources from the first subset assigned to the first access point. *See* **Claim Element 1-C**. Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.

Claim 16	Verizon / CommScope's Infringement
The method of claim 12, where the first access point belongs to a first sector and the second access point belongs to a second sector.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform performs the method of claim 12, where the first access point belongs to a first sector and the second access point belongs to a second sector. *See* Claim 6; *see also, e.g.*, DALIVZN-000428 ("Adjust capacity across the network by sector or channel through a web-based drag-and-drop interface"). Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.

Claim 17	Verizon / CommScope's Infringement
The method of claim 12, where the first access point belongs to a first building and the second access point belongs to a second building.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform performs the method of claim 12, where the first access point belongs to a first sector and the second access point belongs to a second sector. *See* **Claim 7**. Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.

Claim 18	Verizon / CommScope's Infringement
The method of claim 12, wherein at least one of the plurality of wireless access points enables communication between an IP device and one or more central nodes.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform performs the method of claim 12, wherein at least one of the plurality of wireless access points enables communication between an IP device and one or more central nodes. *See* **Claim Element 1-B**. Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.

Claim 20 - Element	Verizon / CommScope's Infringement
[PREAMBLE] One or more non-transitory computer readable storage media storing instructions that, when executed by one or more processors, cause	To the extent the preamble is interpreted to be limiting, the Verizon / CommScope Accused Instrumentalities satisfies this preamble. On information and belief, and based on publicly available information, the Verizon / CommScope Accused Instrumentalities satisfy each and every limitation of claim 20 by including one or more non-transitory computer readable storage media storing instructions that, when executed by one or more processors, cause the one or more processors to perform the steps of claim 20.

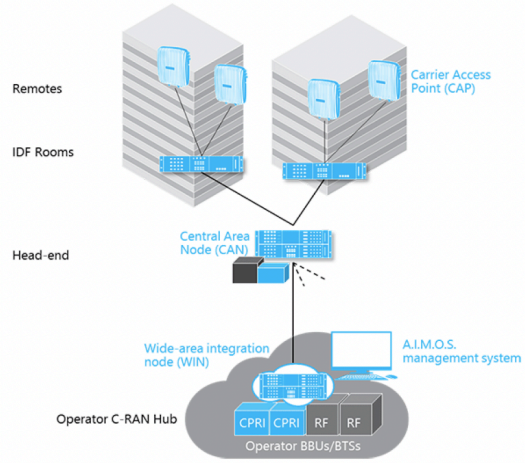
Claim 20 - Element	Verizon / CommScope's Infringement
the one or more processors to perform the steps of:	*See* **Claim 1**. Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.
[ELEMENT 20-A] receiving a plurality of radio resources from an operator hub that operates using a Common Public Radio Interface (CPRI) protocol;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform receives a plurality of radio resources from an operator hub that operates using a Common Public Radio Interface (CPRI) protocol. *See* **Claim Element 1-A**.
[ELEMENT 20-B] assigning a first subset of the plurality of radio resources to a first access point included in a plurality of wireless access points and a second subset of the plurality of radio resources to a second access point included in the plurality of wireless access points, the first subset including more	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform assigns a first subset of the plurality of radio resources to a first access point included in a plurality of wireless access points and a second subset of the plurality of radio resources to a second access point included in the plurality of wireless access points, the first subset including more radio resources than the second subset. *See* **Claim Element 1-C**.

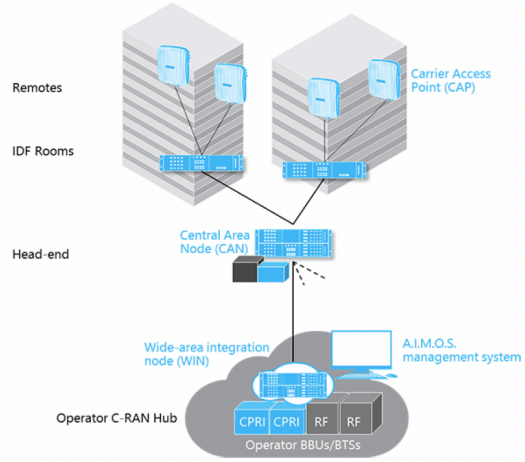
Claim 20 - Element	Verizon / CommScope's Infringement
radio resources than the second subset; and	
[ELEMENT 20-C] in response to a change in need by a number of wireless subscribers coupled to the second access point and which of the second subset is loaded beyond a threshold, assigning one or more additional radio resources of the plurality of radio resources to the second access point.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform in response to a change in need by a number of wireless subscribers coupled to the second access point and which of the second subset is loaded beyond a threshold, assigns one or more additional radio resources of the plurality of radio resources to the second access point. *See* **Claim Element 1-D**.

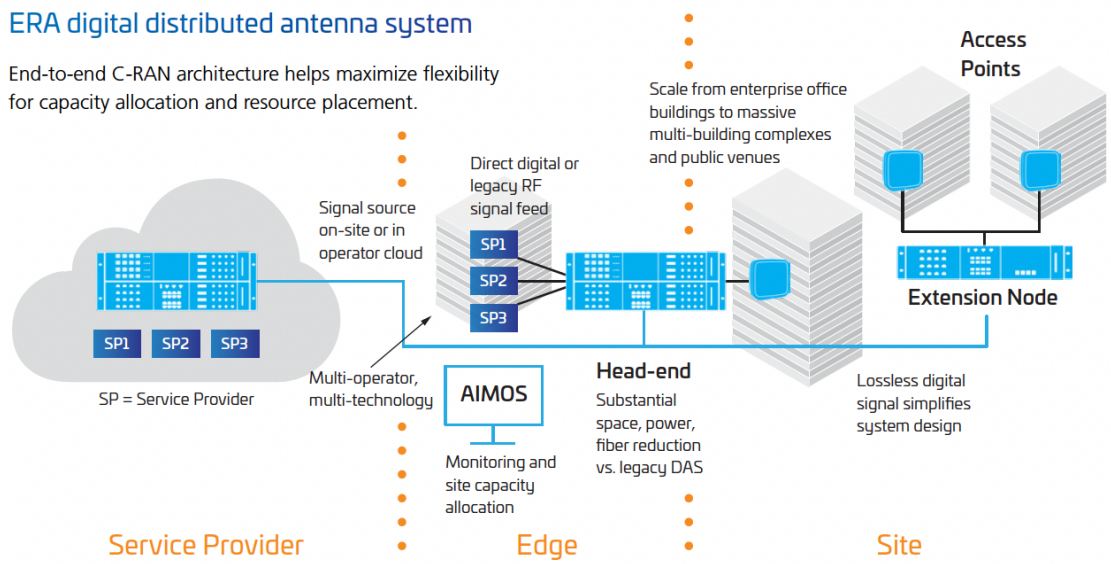
Exhibit B

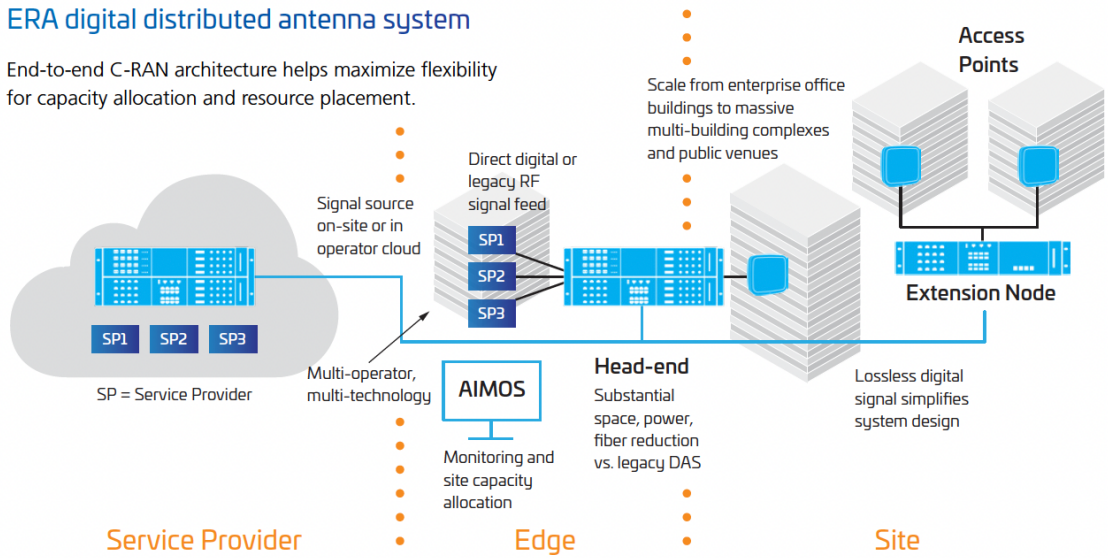
Plaintiff Dali Wireless Inc. ("Dali") contends that Defendants Cellco Partnership D/B/A Verizon Wireless, Verizon Corporate Services Group Inc., Verizon Online LLC (collectively, "Verizon"), CommScope Holding Company, Inc., CommScope Inc., and CommScope Technologies LLC (collectively, "CommScope") (altogether, "Verizon / CommScope") infringe the below-identified claims of Dali's U.S. Patent No. 10,334,499 (the '499 Patent) by deploying, operating, maintaining, testing, and using Verizon's LTE and 5G networks which include equipment relating to solutions for in-building wireless coverage, such as CommScope's ION-E/ERA platform (including but not limited to Wide-Area Integration Node (WIN), Central Area Nodes (CAN), Transport Extension Nodes (TEN), Carrier Access Points (CAP), Universal Access Points (UAP), cabling and switches, antennas, various interface modules and donor cards, and any software running thereon) (collectively, "Verizon / CommScope Accused Instrumentalities"). The specific components, systems, and constructs identified in this chart are for exemplary purposes only and Dali reserves all rights to supplement as additional components, systems, and constructs become known through discovery, as well as after Verizon / CommScope produces documents and source code and/or the Court construes any terms from the claims of the '499 Patent. Claims 1-4, 8-11, 13, 14-16, and 18-19 are infringed under 35 U.S.C. § 271(a) when Verizon / CommScope uses the Verizon / CommScope Accused Instrumentalities.

Claim 1 – Element	Verizon / CommScope's Infringement
[PREAMBLE] A system for transporting wireless communications, comprising:	To the extent the preamble is interpreted to be limiting, the Verizon / CommScope Accused Instrumentalities satisfies this preamble. On information and belief, and based on publicly available information, the Verizon / CommScope Accused Instrumentalities satisfy each and every limitation of claim 1 by providing system for transporting wireless communications. For example, CommScope states that an "all-digital ERA distributed antenna system makes in-building wireless simpler and more economical. Operating on standard IT infrastructure—Category 6A and fiber—these solutions allow operators, neutral hosts and enterprises to provide high capacity with 'five bars' of in-building coverage." *See, e.g.*, DALIVZN-000427.
[ELEMENT 1-A] a baseband unit;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. The ION-E/ERA platform includes a baseband unit.

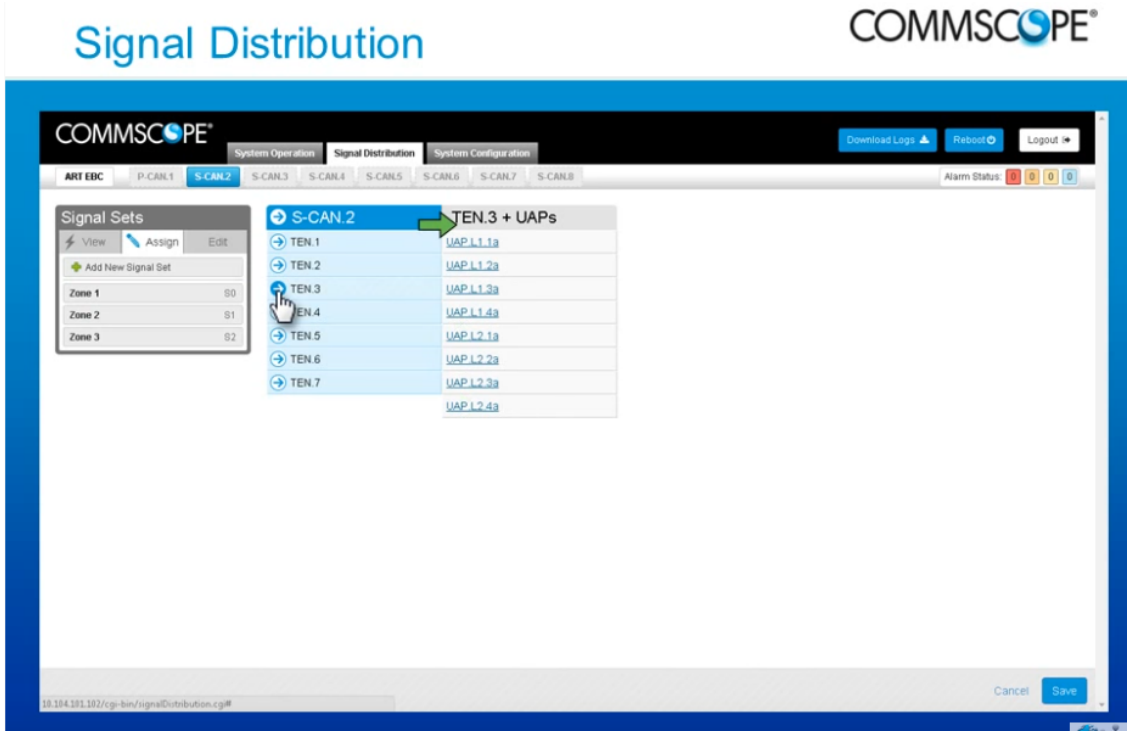
Claim 1 – Element	Verizon / CommScope's Infringement
	For example, CommScope's ION-E/ERA platform includes a Central Area Node ("CAN") "located at the campus or building head-end. It digitizes baseband RF signals, combines signals from different operators and distributes them throughout a building or campus." *See, e.g.*, DALIVZN-000429. **ERA and ION-E** ERA is an extension of the hardware and software architecture that CommScope originally introduced as ION-E. Going forward, all new systems are ERA. Since ION-E and ERA share the same hardware modules, system software and management systems, existing ION-E systems can be updated and expanded using ERA components.  DALIVZN-000428.
[ELEMENT 1-B] a plurality of signal sources, including at least a first signal source and a second signal source;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a plurality of signal sources, including at least a first signal source and a second signal source. For example, CommScope explains that the ION-E/ERA platform "[t]ake[s] advantage of an all-digital CPRI baseband interface that eliminates the need for analog-to-digital conversions, further reducing head-end size and power requirements" and that the ION E/ERA platform includes a "central area node (CAN)," which "digitizes baseband RF signals, combines signals from different operators and distributes them throughout a building or campus." *See, e.g.*, DALIVZN-000428-429.

Claim 1 – Element	Verizon / CommScope's Infringement
[ELEMENT 1-C] a plurality of remote units, including at least a first remote unit and a second remote unit;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a plurality of remote units, including at least a first remote unit and a second remote unit. For example, CommScope's ION-E/ERA platform includes "[a] range of remote access points that convert the digital signal back to radio frequency (RF) for over-the-air transmission." These remote units include "the carrier access point (CAP)" and "the universal access point (UAP)." *See, e.g.*, DALIVZN-000429. **ERA and ION-E** ERA is an extension of the hardware and software architecture that CommScope originally introduced as ION-E. Going forward, all new systems are ERA. Since ION-E and ERA share the same hardware modules, system software and management systems, existing ION-E systems can be updated and expanded using ERA components.  DALIVZN-000428.

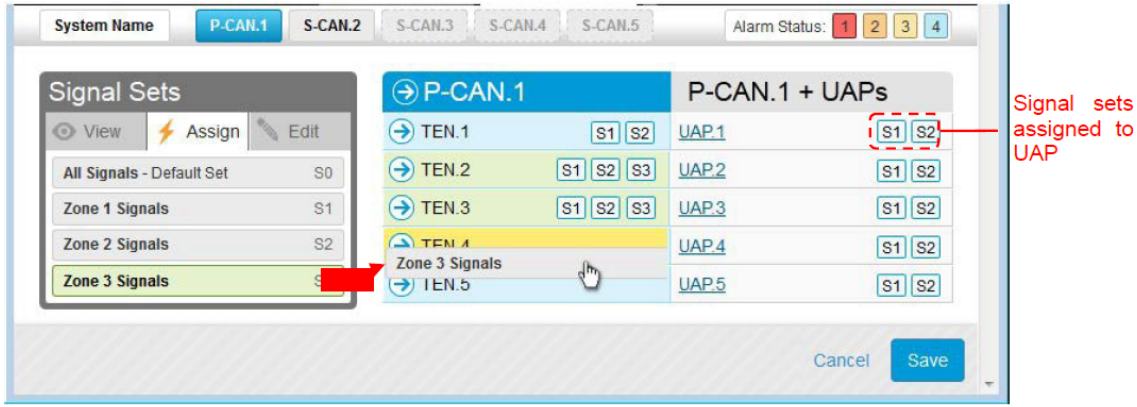
Claim 1 – Element	Verizon / CommScope's Infringement
	 DALIVZN-000423.
[ELEMENT 1-D] wherein the baseband unit comprises a plurality of interfaces to communicatively couple the baseband unit to the plurality of signal sources;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a baseband unit that comprises a plurality of interfaces to communicatively couple the baseband unit to the plurality of signal sources. For example, CommScope's ION-E/ERA platform includes a "CPRI digital donor (CDD)" module. This module "receives CPRI digital signals from compatible operator baseband units (BBU)." *See, e.g.*, DALIVZN-000429. CommScope's ION-E/ERA platform also includes a "RF donor card (RFD) [that] receives analog RF signals from operator base transceiver stations (BTS)." *Id.* Further, CommScope explains that the ION-E/ERA platform "[t]ake[s] advantage of an all-digital CPRI baseband interface that eliminates the need for analog-to-digital conversions, further reducing head-end size and power requirements" and that the ION E/ERA platform includes a "central area node

Claim 1 – Element	Verizon / CommScope's Infringement
	(CAN)," which "digitizes baseband RF signals, combines signals from different operators and distributes them throughout a building or campus." *See, e.g.*, DALIVZN-000428-429. CommScope also explains that the ION E/ERA platform includes a "central area node (CAN)," which "digitizes baseband RF signals, combines signals from different operators and distributes them throughout a building or campus." *See, e.g.*, DALIVZN-000429.  DALIVZN-000423.
[ELEMENT 1-E] wherein the baseband unit is configured to receive a plurality of radio resources from the first signal source and the second signal source;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a baseband unit that is configured to receive a plurality of radio resources from the first signal source and the second signal source. For example, CommScope's ION-E/ERA platform includes a Central Area Node ("CAN") "located at the campus or building head-end. It digitizes baseband RF signals, combines signals from different operators and distributes them throughout a building or campus." *See, e.g.*, *Id.*

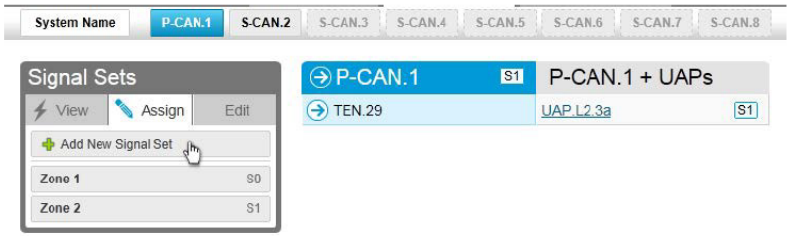
Claim 1 – Element	Verizon / CommScope's Infringement
	For example, CommScope's ION-E/ERA platform includes a "CPRI digital donor (CDD)" that "receives CPRI digital signals from compatible operator baseband units (BBU)." *See, e.g.*, DALIVZN-000429. CommScope's ION-E/ERA platform also includes a "RF donor card (RFD) [that] receives analog RF signals from operator base transceiver stations (BTS)." *Id*.
[ELEMENT 1-F] wherein the baseband unit is configured to send a digital representation of a first set of radio resources to the first remote unit at a first point in time, the first set of radio resources for transmission at an antenna of the first remote unit;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a baseband unit that is configured to send a digital representation of a first set of radio resources to the first remote unit at a first point in time, the first set of radio resources for transmission at an antenna of the first remote unit. For example, CommScope's ION-E/ERA platform includes a baseband unit (CAN) that can send digital representations of a first set of downlink radio resources to a first remote unit (CAP or UAP) at a first point in time, including through the TEN for transmission at an antenna of the first remote unit (CAP or UAP). Specifically, CommScope's ION-E/ERA platform comprises software that allows for the creation of signal sets that are customized sets of radio resources. Multiple signal sets from different base stations can be created and assigned to either a remote unit (CAP or UAP) or a TEN. According to a webinar introduction to ION-E: "[W]e can send any signals to any of the UAPs. … The UAP can have only one assigned signal set. So we create signal sets from Zone 3, Zone 2 and Zone 1, and the signals that … comprise[ ] the signal sets are different based on these operators. So this would be the way we do that. We, for example, create a new signal set called Zone 1 and then select which channels go to … that signal set. And we do Zone 2 and Zone 3. So we can have the same sectors, same signals in multiple signal sets but only one signal set can go to any of the UAPs. You can either send the Zone 1, Zone 2, Zone 3 signal set … directly to a TEN, then it will be automatically be distributed to all of the UAPs that are connected to that TEN. This is probably how you would do that in most cases where you have a zone driven by a TEN." *See, e.g.*, Webinar Introduction to ION-E, Telecom Knowledge Share, Published July 22, 2016,

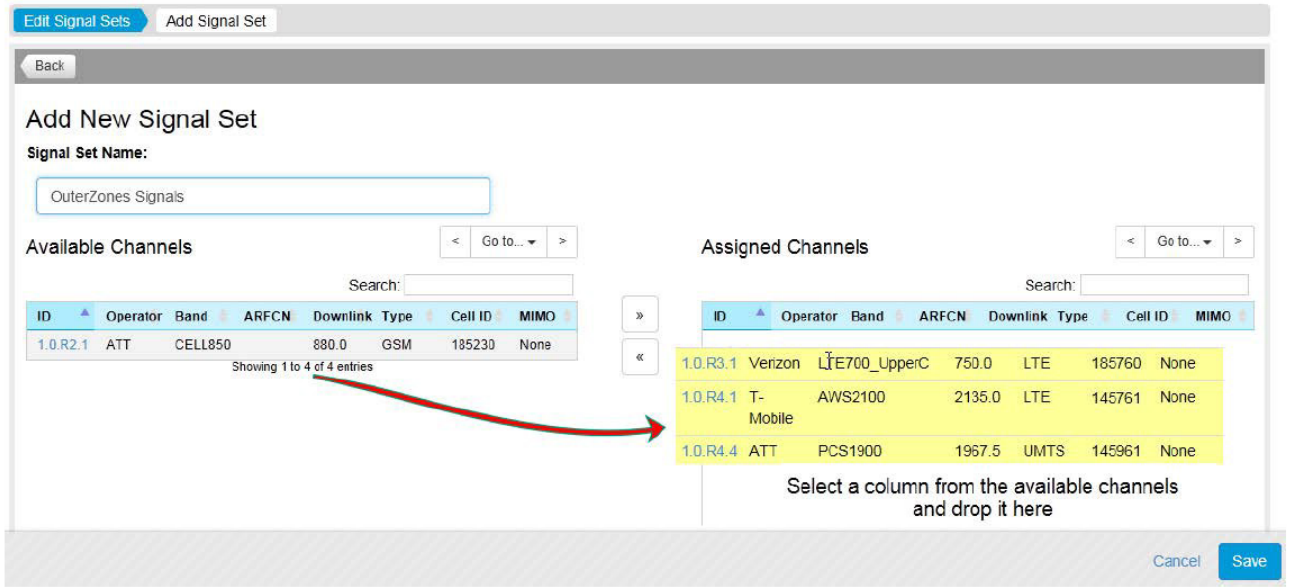
Claim 1 – Element	Verizon / CommScope's Infringement
	available at https://www.youtube.com/watch?v=Kmw2qMlgLrU ("Webinar Introduction to ION E") at 22:00-22:49, last accessed June 8, 2022.  *Id.*
[ELEMENT 1-G] wherein the baseband unit is configured to send a digital representation of a second set of radio resources to the first remote unit at a second point in time, the second	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a baseband unit that is configured to send a digital representation of a second set of radio resources to the first remote unit at a second point in time, the second set of radio resources for transmission at the antenna of the first remote unit. For example, CommScope's ION-E/ERA platform includes a baseband unit (CAN) that can send digital representations of a second set of radio resources to the first remote unit (CAP or UAP) at a second point in time for transmission through the antenna of the remote unit. CommScope's ION-

Claim 1 – Element	Verizon / CommScope's Infringement
set of radio resources for transmission at the antenna of the first remote unit;	E/ERA platform allows for the creation of different signal sets from base stations that comprise different radio resources. A second set of radio resources may be sent to a first remote unit (CAP or UAP) at a different point in time from the first set. According to a CommScope webinar, "[w]e have a full control over each channel, we can turn channels on and off…and we can distribute the channels to any UAP with extreme flexibility, so any signal can go to any UAP… We create signal sets and then those signal sets can be sent via software or software command to them, to any UAP." Webinar Introduction to ION-E, Telecom Knowledge Share, Published July 22, 2016, available at https://www.youtube.com/watch?v=Kmw2qMlgLrU ("Webinar Introduction to ION E") at 22:21-22:48, last accessed June 8, 2022. In addition, multiple signal sets from different base stations can be created and assigned to remote units:

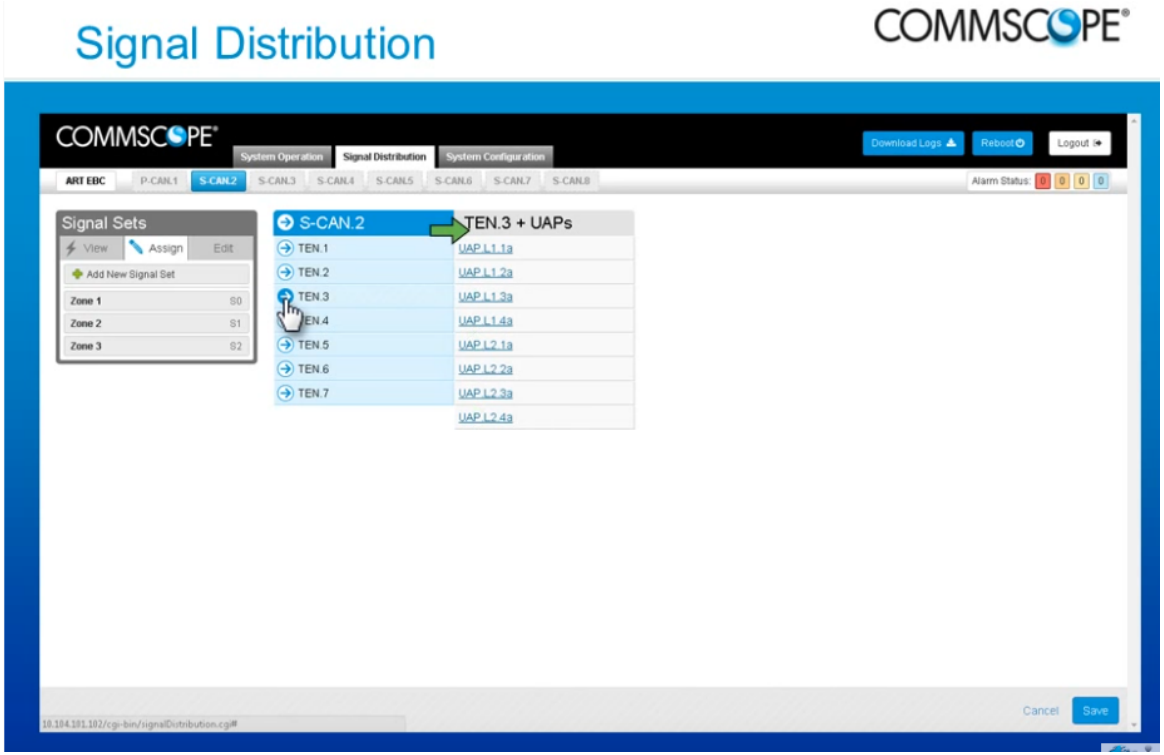
Claim 1 – Element	Verizon / CommScope's Infringement
	Assign Signal Sets (Direct signal traffic to TENs and UAPs) Signal Sets, which are a user-defined set of channels, can be quickly assigned to CANs and all UAPs assigned to them, TENs and all UAPs assigned to them, or to individual UAPs on the *Signal Distribution* page. 1. Click on the *Signal Distribution* tab to open the page. 2. Assign a signal set by: ○ Clicking on a signal set and dragging it onto the a TEN or UAP (set icons adjacent to the device name indicate the sets assigned to a TEN or UAP) ○ Clicking on a signal set to select it (green highlight) and then clicking on each TEN or UAP to which you wish to assign the signal set.  3. Click the *Save* button after you've assigned each signal set DALIVZN-000465.

9

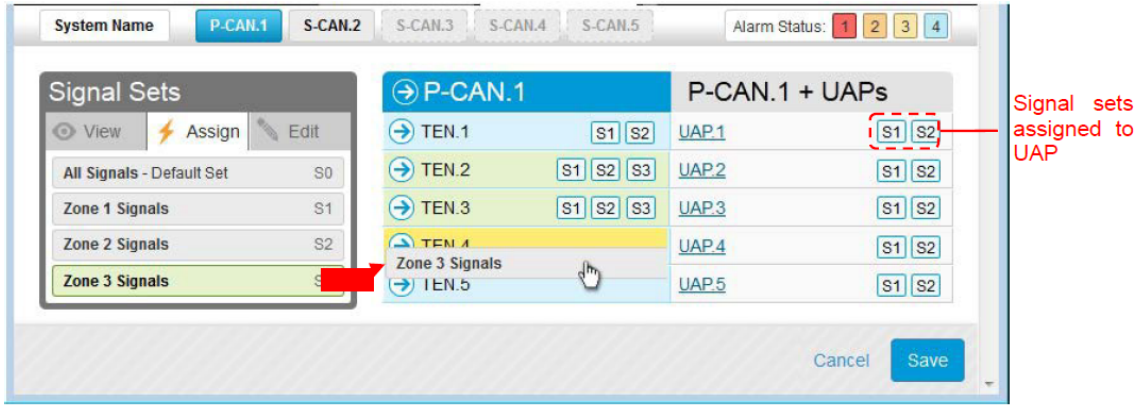
Claim 1 – Element	Verizon / CommScope's Infringement
	5.5. Signal Distribution The ION-E uses signal sets to group the detected signals to simplify signal routing to the radiating elements throughout the system. First the user must create and define the signal sets by assigning channels to the sets. The signal sets are then assigned as needed using drag and drop functionality to route the signals to the TENs and UAPs. **Create and Edit Signal Sets** 1. Click on the *Signal Distribution* tab to open the page. 2. Select a set from the *Signal Sets* list and click the *Edit* button to edit an existing set. 3. Click on the *Add a New Signal Set* link to open the Add *Signal Set* page to create a new set.  4. Enter a Name for the signal set in the *Signal Set Name* field. 5. Click to select a channel from the *Available Channels* list or shift click to select multiple channels and drag them onto the *Assigned Channels* list.

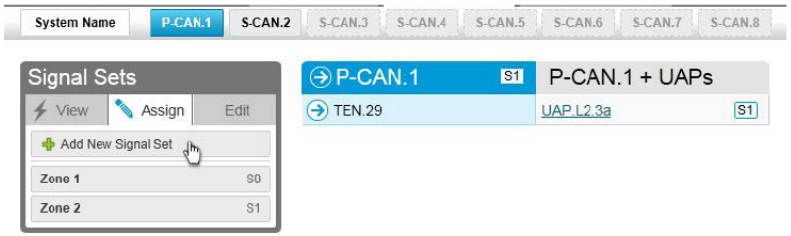
Claim 1 – Element	Verizon / CommScope's Infringement
	 6. Click the *Save* button to save the Signal Set. DALIVZN-000464-465. Further, CommScope's Era System "is an extension of the hardware and software architecture that CommScope originally introduced as ION-E" such that "ION-E and Era share the same hardware modules, system software and management systems" and "existing ION-E systems can be updated and expanded using Era components." See, e.g., DALIVZN-000428. The Era System further provides for dynamic "capacity routing" which, on information and belief, dynamically changes the amount of radio resources between the first set of radio resources and a second set of radio resources.

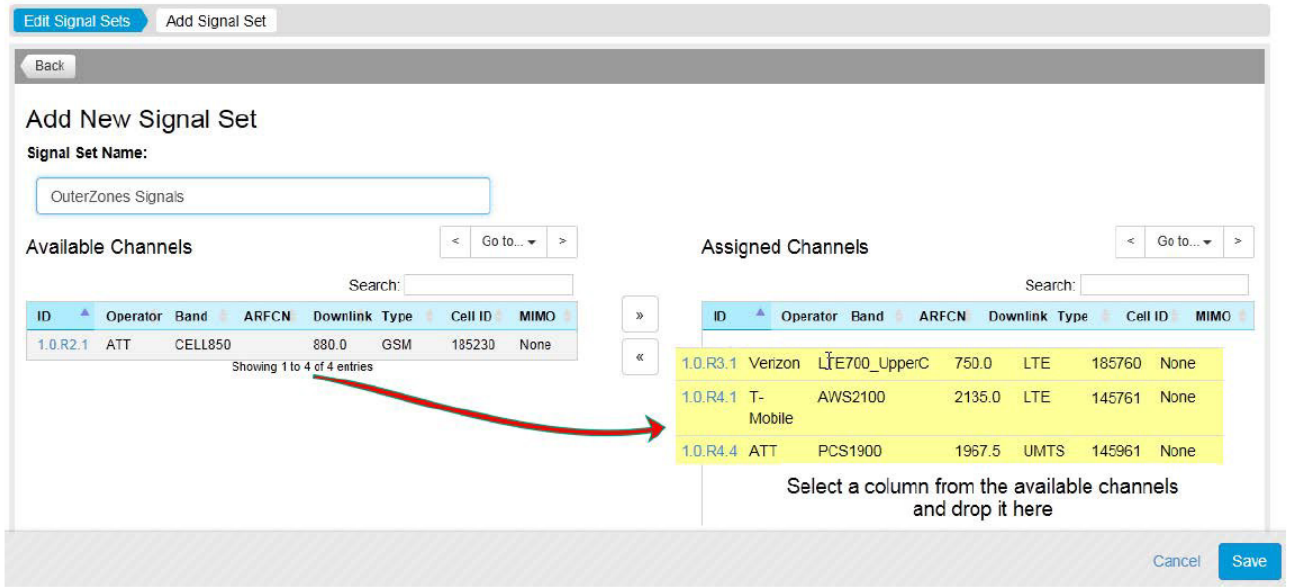
Claim 1 – Element	Verizon / CommScope's Infringement
	• **Capacity can be dynamically shared across many buildings.** The solution adjusts levels to meet variable demand, thanks to its capacity routing capabilities. DALIVZN-000635. Further, CommScope's ION-E/ERA platform is described as "Flexible . . . Shift capacity to where and when you need it, all in software." *See, e.g.*, DALIVZN-000421.
[ELEMENT 1-H] wherein a number of radio resources in the first set of radio resources is different from a number of radio resources in the second set of radio resources; and	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a baseband unit that is configured to send digital representations of a first and second set of radio resources, wherein a number of radio resources in the first set of radio resources is different from a number of radio resources in the second set of radio resources. CommScope's ION-E/ERA platform comprises a baseband unit (CAN) that allows the number of radio resources between the first set of radio resources to be different from the radio resources in the second set of radio resources. CommScope's ION-E/ERA allows for customizable signal sets with different numbers of radio resources per signal set: Specifically, CommScope's ION-E/ERA platform comprises software that allows for the creation of signal sets that are customized sets of radio resources. Multiple signal sets from different base stations can be created and assigned to either a remote unit (CAP or UAP) or a TEN. According to a webinar introduction to ION-E: "[W]e can send any signals to any of the UAPs. … The UAP can have only one assigned signal set. So we create signal sets from Zone 3, Zone 2 and Zone 1, and the signals that … comprise[ ] the signal sets are different based on these operators. So this would be the way we do that. We, for example, create a new signal set called Zone 1 and then select which channels go to … that signal set. And we do Zone 2 and Zone 3. So we can have the same sectors, same signals in multiple signal sets but only one signal set can go to any of the UAPs. You can either send the Zone 1, Zone 2, Zone 3 signal set … directly to a TEN, then it will be automatically be distributed to all of the UAPs that are connected to

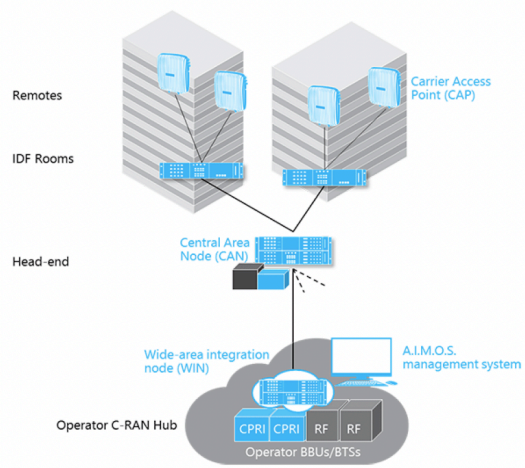
Claim 1 – Element	Verizon / CommScope's Infringement
	that TEN. This is probably how you would do that in most cases where you have a zone driven by a TEN." *See* Webinar Introduction to ION-E, Telecom Knowledge Share, Published July 22, 2016, available at https://www.youtube.com/watch?v=Kmw2qMlgLrU ("Webinar Introduction to ION E") at 23:32-24:52, last accessed June 8, 2022.  *Id*. Further, CommScope's ION-E/ERA platform's baseband unit (CAN) can send digital representations of a second set of radio resources to the first remote unit (CAP or UAP) at a second point in time for transmission through the antenna of the remote unit. CommScope's ION-E/ERA platform allows for the creation of different signal sets from base stations that comprise different radio resources. A second

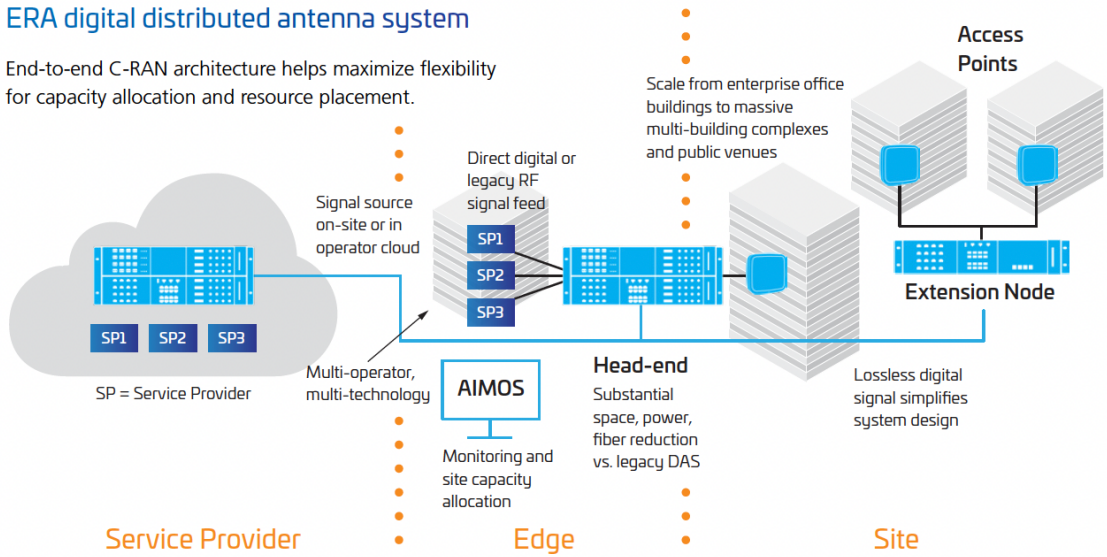
Claim 1 – Element	Verizon / CommScope's Infringement
	set of radio resources may be sent to a first remote unit (CAP or UAP) at a different point in time from the first set. According to a CommScope webinar, "[w]e have a full control over each channel, we can turn channels on and off…and we can distribute the channels to any UAP with extreme flexibility, so any signal can go to any UAP… We create signal sets and then those signal sets can be sent via software or software command to them, to any UAP." Webinar Introduction to ION-E, Telecom Knowledge Share, Published July 22, 2016, available at https://www.youtube.com/watch?v=Kmw2qMlgLrU ("Webinar Introduction to ION E") at 22:21-22:48, last accessed June 8, 2022. In addition, multiple signal sets from different base stations can be created and assigned to remote units:

Claim 1 – Element	Verizon / CommScope's Infringement
	Assign Signal Sets (Direct signal traffic to TENs and UAPs) Signal Sets, which are a user-defined set of channels, can be quickly assigned to CANs and all UAPs assigned to them, TENs and all UAPs assigned to them, or to individual UAPs on the *Signal Distribution* page. 1. Click on the *Signal Distribution* tab to open the page. 2. Assign a signal set by: ○ Clicking on a signal set and dragging it onto the a TEN or UAP (set icons adjacent to the device name indicate the sets assigned to a TEN or UAP) ○ Clicking on a signal set to select it (green highlight) and then clicking on each TEN or UAP to which you wish to assign the signal set.  3. Click the *Save* button after you've assigned each signal set DALIVZN-000465.

Claim 1 – Element	Verizon / CommScope's Infringement
	5.5. Signal Distribution The ION-E uses signal sets to group the detected signals to simplify signal routing to the radiating elements throughout the system. First the user must create and define the signal sets by assigning channels to the sets. The signal sets are then assigned as needed using drag and drop functionality to route the signals to the TENs and UAPs. **Create and Edit Signal Sets** 1. Click on the *Signal Distribution* tab to open the page. 2. Select a set from the *Signal Sets* list and click the *Edit* button to edit an existing set. 3. Click on the *Add a New Signal Set* link to open the Add *Signal Set* page to create a new set.  4. Enter a Name for the signal set in the *Signal Set Name* field. 5. Click to select a channel from the *Available Channels* list or shift click to select multiple channels and drag them onto the *Assigned Channels* list.

Claim 1 – Element	Verizon / CommScope's Infringement
	 6. Click the *Save* button to save the Signal Set. DALIVZN-000464-465. Further, CommScope's Era System "is an extension of the hardware and software architecture that CommScope originally introduced as ION-E" such that "ION-E and Era share the same hardware modules, system software and management systems" and "existing ION-E systems can be updated and expanded using Era components." See, e.g., DALIVZN-000428. The Era System further provides for dynamic "capacity routing" which, on information and belief, dynamically changes the amount of radio resources between the first set of radio resources and a second set of radio resources.

Claim 1 – Element	Verizon / CommScope's Infringement
	• **Capacity can be dynamically shared across many buildings.** The solution adjusts levels to meet variable demand, thanks to its capacity routing capabilities. DALIVZN-000635. Further, CommScope's ION-E/ERA platform is described as "Flexible . . . Shift capacity to where and when you need it, all in software." *See, e.g.*, DALIVZN-000421.
[ELEMENT 1-I] wherein the baseband unit is configured to receive digital signals from each of the plurality of remote units.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a baseband unit that is configured to receive digital signals from each of the plurality of remote units. CommScope's ION-E/ERA platform includes baseband units (CAN) that can both send and receive digital signals to and from the remote units. **ERA and ION-E** ERA is an extension of the hardware and software architecture that CommScope originally introduced as ION-E. Going forward, all new systems are ERA. Since ION-E and ERA share the same hardware modules, system software and management systems, existing ION-E systems can be updated and expanded using ERA components. 

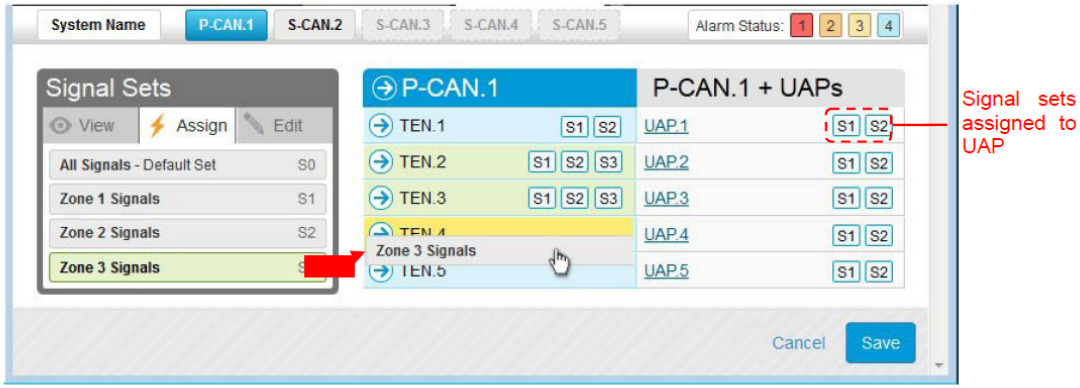
Claim 1 – Element	Verizon / CommScope's Infringement
	DALIVZN-000428.  DALIVZN-000423.

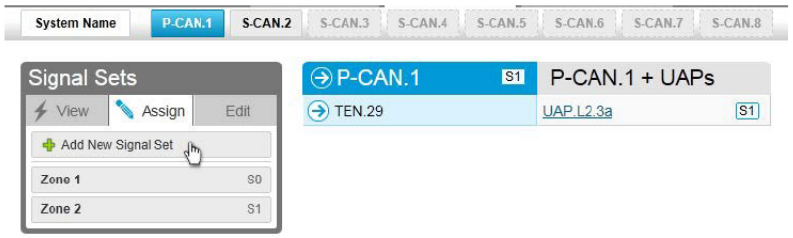
Claim 2	Verizon / CommScope's Infringement
The system of claim 1 wherein the baseband unit is configured to packetize each digital representation of a radio resource.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform's baseband unit is configured to packetize each digital representation of a radio resource. An Era and ION-E Software Guide explains that the CANs packetize the digital representations received from the signal source.

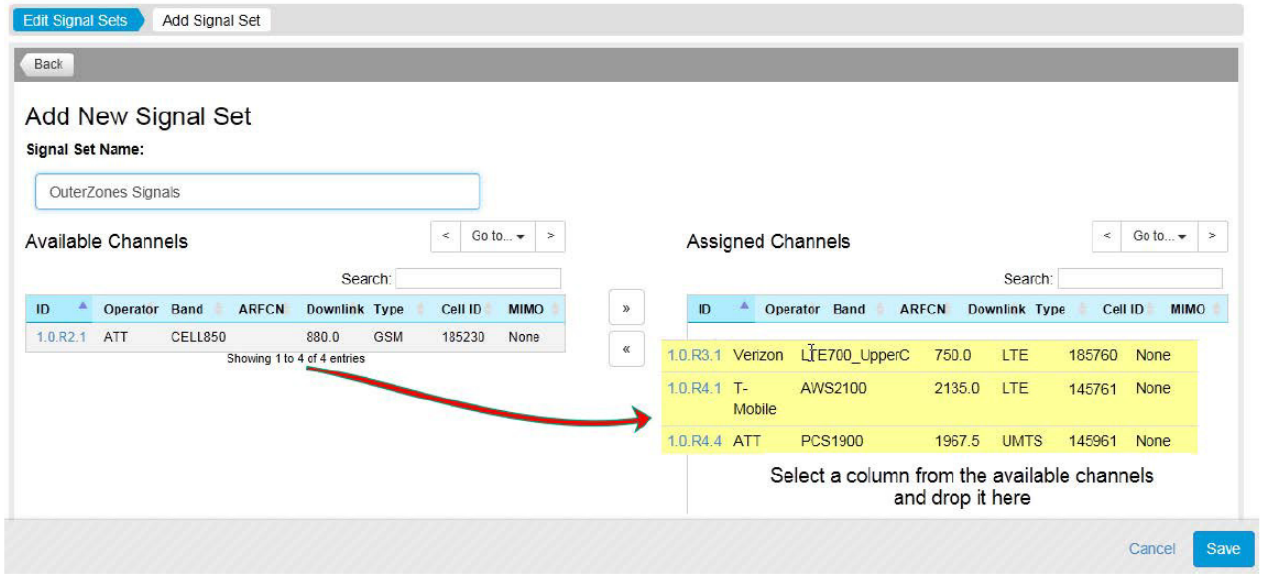
Claim 2	Verizon / CommScope's Infringement
	A 2018 CommScope document titled "Era C-RAN antenna system: In-building wireless capacity without constraints" discloses that in the Era system the host unit communicates using "Common Public Radio Interface (CPRI)." DALIVZN-000635-36 CPRI is a digital communications protocol that requires the formation of frames or packets and therefore packetizes digital representations of the radio resource signals. Common Public Radio Interface Specification V6.0 (2013). The CommScope webinar on the ION-E system architecture further explains: "On a high level we have [an] eNode B or the LTE base station connecting to a component called e-POI, or enhanced point of interface, which receives the signal and then has in the front QMA ports with a DIN connector in the back and a QMA connector in the front which then connects to our RF donor card which is part of our CAN, or central area node, and after that we convert the signals to software domain and do all the routing in the software domain." *See* Webinar Introduction to ION-E, Telecom Knowledge Share, Published July 22, 2016, available at https://www.youtube.com/watch?v=Kmw2qMlgLrU ("Webinar Introduction to ION E") at 13:45-14:25, last accessed June 8, 2022. "The CAN - where the RF signals are coming from the base station, received at the RF donor card, and then we manage the distribution of those signals to the UAPs, or to the TENs and to their UAPs in software domain. … CAN is the base station interface and that is where we manage the central signal distribution. We send any of the incoming signals to any of the UAPs." *Id.*

Claim 3	Verizon / CommScope's Infringement
The system of claim 1 wherein the digital representation of the first set of radio resources includes destination information identifying	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the system of claim 1 wherein the digital representation of the first set of radio resources includes destination information identifying the first remote unit and the digital representation of the second set of radio resources includes destination information identifying the first remote unit.

Claim 3	Verizon / CommScope's Infringement
the first remote unit and the digital representation of the second set of radio resources includes destination information identifying the first remote unit.	CommScope's ION-E/ERA platform, the digital representations of the radio resources are directed to specific individual remote access points (i.e., location information): For example, CommScope's ION-E/ERA platform comprises a base band unit (CAN) that allows for the creation of different signal sets from base stations that comprise different downlink channel signals. Within the software, a set of downlink channel signals may be sent to specific remote unit (CAP or UAP). According to a CommScope webinar, "[w]e have a full control over each channel, we can turn channels on and off…and we can distribute the channels to any UAP with extreme flexibility, so any signal can go to any UAP… We create signal sets and then those signal sets can be sent via software or software command to them, to any UAP." See Webinar Introduction to ION-E, Telecom Knowledge Share, Published July 22, 2016, available at https://www.youtube.com/watch?v=Kmw2qMlgLrU ("Webinar Introduction to ION E") at 22:21-22:48, last accessed June 8, 2022. An ION-E user manual further explains how digital signal sets ("digital representations") can be assigned and distributed to specific UAPs:

Claim 3	Verizon / CommScope's Infringement
	Assign Signal Sets (Direct signal traffic to TENs and UAPs) Signal Sets, which are a user-defined set of channels, can be quickly assigned to CANs and all UAPs assigned to them, TENs and all UAPs assigned to them, or to individual UAPs on the *Signal Distribution* page. 1. Click on the *Signal Distribution* tab to open the page. 2. Assign a signal set by: ○ Clicking on a signal set and dragging it onto the a TEN or UAP (set icons adjacent to the device name indicate the sets assigned to a TEN or UAP) ○ Clicking on a signal set to select it (green highlight) and then clicking on each TEN or UAP to which you wish to assign the signal set.  3. Click the *Save* button after you've assigned each signal set DALIVZN-000465.

Claim 3	Verizon / CommScope's Infringement
	5.5. Signal Distribution The ION-E uses signal sets to group the detected signals to simplify signal routing to the radiating elements throughout the system. First the user must create and define the signal sets by assigning channels to the sets. The signal sets are then assigned as needed using drag and drop functionality to route the signals to the TENs and UAPs. **Create and Edit Signal Sets** 1. Click on the *Signal Distribution* tab to open the page. 2. Select a set from the *Signal Sets* list and click the *Edit* button to edit an existing set. 3. Click on the *Add a New Signal Set* link to open the Add *Signal Set* page to create a new set.  4. Enter a Name for the signal set in the *Signal Set Name* field. 5. Click to select a channel from the *Available Channels* list or shift click to select multiple channels and drag them onto the *Assigned Channels* list.

Claim 3	Verizon / CommScope's Infringement
	 6. Click the *Save* button to save the Signal Set. DALIVZN-000464-465. Further, CommScope's ION-E/ERA platform "[o]perates on standard IT cabling." *See, e.g.*, DALIVZN-000421. CommScope's ION-E/ERA platform also provides for dynamic "capacity routing" which, on information and belief, provides means for the radio resources directed to specific remote access points to be changed. *See, e.g.*, DALIVZN-000635. CommScope's ION-E/ERA's Central Area Node (CAN) sends digital transmissions via CPRI and standard IT cabling. CPRI involves the use of packetized data including Control & Management Channel maps and encodes ethernet packets for transmission with destination information identifying the remote units. Further, both ethernet and IP protocols have destination information. For example, ethernet has Destination Mac Address (see e.g., Ethernet 802.3 frame protocol standard) while IPv4 and IPv6 have destination IP address (see e.g., Internet Protocol version 4 and Internet Protocol version 6 protocol standards).

Claim 4	Verizon / CommScope's Infringement
The system of claim 1 wherein the first set of radio resources is a subset of the plurality of radio resources and includes at least some radio resources from the first signal source and at least some radio resources from the second signal source.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the system of claim 1 wherein the first set of radio resources is a subset of the plurality of radio resources and includes at least some radio resources from the first signal source and at least some radio resources from the second signal source. *See* **Claim Elements 1-E**, **1-F**, and **1-G**.

Claim 8 - Element	Verizon / CommScope's Infringement
[PREAMBLE] A baseband controller for use in the transport of wireless communications, comprising:	To the extent the preamble is interpreted to be limiting, the Verizon / CommScope Accused Instrumentalities satisfies this preamble. On information and belief, and based on publicly available information, the Verizon / CommScope Accused Instrumentalities satisfy each and every limitation of claim 8 by providing a baseband controller for use in the transport of wireless communications. *See* **Claim 1**.
[ELEMENT 8-A] a plurality of interfaces to communicatively couple a baseband unit to a plurality of signal sources, including at least a first signal source and a second signal source;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a plurality of interfaces to communicatively couple a baseband unit to a plurality of signal sources, including at least a first signal source and a second signal source. *See* **Claim Element 1-D**.

Claim 8 - Element	Verizon / CommScope's Infringement
[ELEMENT 8-B] at least one interface to communicatively couple the baseband unit to a plurality of remote units, including at least a first remote unit;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes at least one interface to communicatively couple the baseband unit to a plurality of remote units, including at least a first remote unit. *See* **Claim Elements 1-C**, **1-F**, **1-G**, and **1-I**.
[ELEMENT 8-C] wherein the baseband unit is configured to receive a plurality of radio resources from the first signal source and the second signal source;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a baseband unit configured to receive a plurality of radio resources from the first signal source and the second signal source. *See* **Claim Element 1-E**.
[ELEMENT 8-D] wherein the baseband unit is configured to send digital representations of a first set of radio resources to the first remote unit at a first point in time, the first set of radio resources for transmission at an antenna of the first remote unit;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a baseband unit configured to send digital representations of a first set of radio resources to the first remote unit at a first point in time, the first set of radio resources for transmission at an antenna of the first remote unit. *See* **Claim Element 1-F**.
[ELEMENT 8-E] wherein the baseband unit is configured to send digital representations of a second set of radio resources to the first remote unit at a second	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a baseband unit configured to send digital representations of a second set of radio resources to the first remote unit at a second point in time, the second set of radio resources for transmission at the antenna of the first remote unit. *See* **Claim Element 1-G**.

Claim 8 - Element	Verizon / CommScope's Infringement
point in time, the second set of radio resources for transmission at the antenna of the first remote unit; and	
[ELEMENT 8-F] wherein a number of radio resources in the first set of radio resources is different from a number of radio resources in the second set of radio resources.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform includes a baseband unit that is configured to send digital representations of a first and second set of radio resources, wherein a number of radio resources in the first set of radio resources is different from a number of radio resources in the second set of radio resources. *See* **Claim Element 1-H**.

Claim 9	Verizon / CommScope's Infringement
The baseband controller of claim 8 wherein the baseband unit is configured to packetize each digital representation of a radio resource.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the baseband controller of claim 8 wherein the baseband unit is configured to packetize each digital representation of a radio resource. *See* **Claim 2**.

Claim 10	Verizon / CommScope's Infringement
The baseband controller of claim 8 wherein the digital representation of the first set of radio resources includes destination information identifying the first remote unit and the digital representation of the second set of radio resources includes destination information identifying the first remote unit.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the baseband controller of claim 8 wherein the digital representation of the first set of radio resources includes destination information identifying the first remote unit and the digital representation of the second set of radio resources includes destination information identifying the first remote unit. *See* **Claim 3**.

Claim 11	Verizon / CommScope's Infringement
The baseband controller of claim 8 wherein the first set of radio resources is a subset of the plurality of radio resources and includes at least some radio resources from the first signal source and at least some radio resources from the second signal source.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the baseband controller of claim 8 wherein the first set of radio resources is a subset of the plurality of radio resources and includes at least some radio resources from the first signal source and at least some radio resources from the second signal source. *See* **Claim Elements 1-E**, **1-F**, and **1-G**.

Claim 13	Verizon / CommScope's Infringement
The baseband controller of claim 8 wherein the plurality of radio resources include a first composite signal from the first signal source and a second composite signal from the second signal source, and the baseband unit is configured to form the digital representation of the first set of radio resources from a first subset of the first composite signal and a second subset of the second composite signal.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform meets the baseband controller of claim 8 wherein the plurality of radio resources include a first composite signal from the first signal source and a second composite signal from the second signal source, and the baseband unit is configured to form the digital representation of the first set of radio resources from a first subset of the first composite signal and a second subset of the second composite signal. *See* **Claim Elements 1-E**, **1-F**, and **1-G**.

Claim 14 - Element	Verizon / CommScope's Infringement
[PREAMBLE] A method for providing digital signals in a Distributed Antenna System (DAS), comprising:	To the extent the preamble is interpreted to be limiting, the Verizon / CommScope Accused Instrumentalities satisfies this preamble. On information and belief, and based on publicly available information, the Verizon / CommScope Accused Instrumentalities satisfy each and every limitation of claim 14 by performing a method for providing digital signals in a Distributed Antenna System (DAS). *See* **Claim Element 1**. Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.

Claim 14 - Element	Verizon / CommScope's Infringement
[ELEMENT 14-A] receiving at a baseband unit, from a plurality of signal sources including at least a first signal source and a second signal source, a plurality of radio resources;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform receives at a baseband unit, from a plurality of signal sources including at least a first signal source and a second signal source, a plurality of radio resources. *See* **Claim Element 1-E**.
[ELEMENT 14-B] transmitting from the baseband unit, at a first point in time, a digital representation of a first set of radio resources to a first remote unit, the first set of radio resources for transmission at an antenna of the first remote unit;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform transmits from the baseband unit, at a first point in time, a digital representation of a first set of radio resources to a first remote unit, the first set of radio resources for transmission at an antenna of the first remote unit. *See* **Claim Element 1-F**.
[ELEMENT 14-C] transmitting from the baseband unit, at a second point in time, a digital representation of a second set of radio resources to the first remote unit, the second set of radio resources for transmission at the antenna of the first remote unit;	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform transmits from the baseband unit, at a second point in time, a digital representation of a second set of radio resources to the first remote unit, the second set of radio resources for transmission at the antenna of the first remote unit. *See* **Claim Element 1-G**.

Claim 14 - Element	Verizon / CommScope's Infringement
[ELEMENT 14-D] wherein a number of radio resources in the first set of radio resources is different from a number of radio resources in the second set of radio resources.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform performs the method of claim 14, wherein a number of radio resources in the first set of radio resources is different from a number of radio resources in the second set of radio resources. *See* **Claim Element 1-H**.

Claim 15	Verizon / CommScope's Infringement
The method of claim 14 wherein the digital representation of the first set of radio resources includes destination information identifying the first remote unit and the digital representation of the second set of radio resources includes destination information identifying the second remote unit.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform performs the method of claim 14 wherein the digital representation of the first set of radio resources includes destination information identifying the first remote unit and the digital representation of the second set of radio resources includes destination information identifying the second remote unit. *See* **Claim 3**.

Claim 16	Verizon / CommScope's Infringement
The method of claim 14 wherein the first set of radio resources is a subset of the plurality of radio resources and includes at least some radio resources	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform performs the method of claim 14 wherein the first set of radio resources is a subset of the plurality of radio resources and includes at least some radio resources from the first signal source and at least some radio resources from the second signal source. *See* **Claim Elements 1-E**, **1-F**, and **1-G**.

Claim 16	Verizon / CommScope's Infringement
from the first signal source and at least some radio resources from the second signal source.	Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.

Claim 18	Verizon / CommScope's Infringement
The method of claim 14 wherein the plurality of radio resources include a first composite signal from the first signal source and a second composite signal from the second signal source, the method further comprising forming, at the baseband unit, the digital representation of the first set of radio resources from a first subset of the first composite signal and a second subset of the second composite signal.	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform performs the method of claim 14 wherein the plurality of radio resources include a first composite signal from the first signal source and a second composite signal from the second signal source, the method further comprising forming, at the baseband unit, the digital representation of the first set of radio resources from a first subset of the first composite signal and a second subset of the second composite signal. *See* **Claim Elements 1-E**, **1-F**, and **1-G**. Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.

Claim 19	Verizon / CommScope's Infringement
The method of claim 14 further comprising packetizing, at the baseband unit, at least a	The Verizon / CommScope Accused Instrumentalities satisfy this claim element. CommScope's ION-E/ERA platform performs the method of claim 14 further comprising packetizing, at the baseband unit, at least a subset of the plurality of radio resources. *See* **Claim 2**.

Claim 19	Verizon / CommScope's Infringement
subset of the plurality of radio resources.	Further, this method is infringed by Verizon / CommScope when the Verizon / CommScope Accused Instrumentalities are tested and/or used by Verizon / CommScope.