

**System Name: Jackson County**  
**Case # 19-M-235**  
**Date Filed: 2/1/19**

**Department Review of Plan Modification**

<b>Requirement</b>	<b>Information Included</b>	<b>Staff Comment</b>
<b>Contact and 9-1-1 System information</b>	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	Melinda Woker 303 N. Robinson Circle Carbondale, IL 62901 (618) 457-5911 (Office) (618) 967-6581 (Cell) mkwoker@jc911.org
<b>Verification</b>	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	
<b>Letter of Intent</b>	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	
<b>Plan Narrative (if incorporating an NG9-1-1 solution, narrative must include the following: )</b>	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	<p>The Jackson County ETSB is requesting to change its 9-1-1 System Service Provider from NG-911, Inc. to INdigital Telecom (INdigital). The existing Solacom IP selective routing system will be re-provisioned as an IP based NG9-1-1 call handling system. The Jackson County ETSB is upgrading its call delivery system to ensure that all carriers are connected directly to the selective routers serving the PSAP.</p> <p>The network will be provisioned as an IP based, Next Generation i3 capable network and will deliver calls using IP technology to the PSAP. The system will have redundant Legacy Network Gateways (LNGs) and Emergency Service Routing Proxies (ESRPs), otherwise referred to as selective routers that will handle all call routing for the PSAP. One set of call routing elements is located in the Consolidated Communications Mattoon central office and the other is located in the Shawnee Communications central office in Rosiclare, Illinois.</p> <p>Given the current structure of the network, the implementation of the new 9-1-1 system provider will occur in 2 stages.</p>

**System Name: Jackson County**  
**Case # 19-M-235**  
**Date Filed: 2/1/19**

		<p>Stage 1: The first stage of implementation is the conversion from NG-911, Inc. to INdigital as the new 9-1-1 system provider. The carrier trunks will remain connected to Frontier's Carbondale central office. New network connections will be established from Carbondale to gateways located at the existing data centers in Murphysboro and Harrisburg. 9-1-1 calls will be directed over the new INdigital connections at Carbondale to the gateways at the data centers and then be delivered to INdigital's IP based selective routers/ESRPs located in Mattoon and Rosiclare for selective routing to the appropriate PSAP. 9-1-1 Selective Routing for 9-1-1 call delivery and Automatic Number Identification (ANI) and Automatic Location Identification (ALI) delivery will be provided by the INdigital 9-1-1 IP based selective routers/ESRPs and ALI database management system.</p> <p>During Stage 1, INdigital will mirror the current ALI database by requesting a copy of the 9-1-1 database from Frontier who is currently administering the 9-1-1 database as a subcontractor. INdigital will also request a copy of the MSAG from the 9-1-1 System and will use established update processes with Frontier until the Stage 2 carrier migration is complete.</p> <p>The current ESInet that exists between the two data centers and the PSAP will remain in place for call delivery. INdigital will install tertiary internet connections to the PSAP along with INdigital's MEVO backup solution prior to the Stage 1 cutover. The PSAP will have the ability to use the hot standby disaster recovery platform in an 'active + active' 9-1-1 delivery platform. This will be used as a backup during the Stage 1 cutover providing the PSAP with the ability to receive 9-1-1 calls with ANI and ALI should there be any issues during the Stage 1 cutover.</p> <p>Split exchanges and PS ALI subscriber calls will route as they are currently routing today during the Stage 1 cutover.</p> <p>Stage 2: The carriers that are currently connected to Carbondale for Jackson County will establish new 9-1-1 trunks to the INdigital selective routers/or LNGs that are located in Mattoon and Rosiclare, Illinois. INdigital will work with each carrier to determine the type of</p>
--	--	--

**System Name: Jackson County**  
**Case # 19-M-235**  
**Date Filed: 2/1/19**

		trunk signaling and establish points of interconnection for 9-1-1 call delivery.
Name of certified 9-1-1 system provider	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A <input type="checkbox"/>	INdigital Telecom
Explanation of the national standards, protocols and/or operating measures that will be followed	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A <input type="checkbox"/>	The system will comply with all State and Federal requirements and be compliant with the National Emergency Number Association Standards.
Explanation of measures taken to create a robust, reliable and diverse/redundant network and whether other 9-1-1 Authorities will be sharing the equipment	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A <input type="checkbox"/>	The network will be provisioned as an IP based, Next Generation i3 capable network and will deliver calls using IP technology to the PSAP. Redundant Legacy Network Gateways (LNGs) and Emergency Service Routing Proxies (ESRPs) otherwise referred to as selective routers will handle all call routing for the PSAP. One set of call routing elements is located in the Consolidated Communications Mattoon, IL Central Office and the other is located in the Shawnee Communications Central Office in Rosiclare, IL.
Explanation of how the existing 9-1-1 traditional legacy wireline, wireless and VoIP network, along with the databases, will interface and/or be transitioned into the NG9-1-1 system	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A <input type="checkbox"/>	All carriers that are currently connected to the Frontier Carbondale central office for Jackson County will establish new 9-1-1 trunks to the INdigital selective routers/or LNGs that are located in Mattoon and Rosiclare. INdigital will work with each carrier to determine the type of trunk signaling and establish points of interconnection for 9-1-1 call delivery. The carriers can deliver 9-1-1 calls to INdigital ESRPs or LNG's by using SS7 signaling or by using a SIP trunk IP based signaling. PS/ALI subscribers will be identified and included in the network and database migration plans.
Explanation of how split exchanges will be handled	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A <input type="checkbox"/>	Split exchanges will be discussed and the routing will be thoroughly planned for based on ICC/ISP orders during the Stage 2 industry project calls that will be hosted by INdigital on a regular basis. These project calls will include all participating Service Providers, ICC and ISP Staff as well as the 9-1-1 authority.
Explanation of how the databases will be maintained and how address errors will be corrected and updated on a continuing basis	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A <input type="checkbox"/>	INdigital will request TN loads and updates from the carriers prior to the cutover and assume all 9-1-1 SSP administrative responsibilities for the database at the time of conversion. INdigital will work with the carriers and the ETSB to keep the database current and in compliance with Illinois State law on an ongoing basis.

**System Name: Jackson County**  
**Case # 19-M-235**  
**Date Filed: 2/1/19**

			The Solacom ANI/ALI controllers will retrieve the ALI information from INdigital's Database Management System and deliver it to the PSAP call station equipment. The current Datamaster System will also be re-configured at this time by the contracted maintenance provider to no longer provide ALI information to the PSAPs.
	Explanation of who will be responsible for updating and maintaining the data, at a minimum on a daily basis Monday through Friday	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A <input type="checkbox"/>	INdigital will administer the 9-1-1 database and MSAG for the subscribers that reside in the service territory of the 9-1-1 system.
	Explanation of security measures placed on the IP 9-1-1 network and equipment to safeguard it from malicious attacks or threats to the system operation and what level of confidentiality will be placed on the system in order to keep unauthorized individuals from accessing it	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A <input type="checkbox"/>	All access to the system is secured by individual user level two factor login credentials. The IP based call delivery network is private with no outside access.
<b>Financial Information</b>			
	Annual recurring 9-1-1 network costs prior to modification	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	\$146,356.00
	Projected annual recurring 9-1-1 network costs after modification	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	\$107,003.00
	Installation cost of the project	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	\$65,769.00
	Anticipated annual revenues	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	\$744,000.00
<b>Five Year Strategic Plan</b>		Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	
<b>Communities Served</b>		Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	

**System Name: Jackson County**  
**Case # 19-M-235**  
**Date Filed: 2/1/19**

<b>Participating Agencies</b>		Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	
<b>Adjacent Agencies</b>		Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	
<b>Carrier Listing</b>		Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	
<b>Attachments</b>		If changes necessitate new versions	
	Ordinances	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
	Intergovernmental agreement(s)	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
	Contracts	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	An Enhanced 9-1-1 Services Agreement between Jackson County and INdigital Telecom was included in the plan.
	Back-up PSAP agreement	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Jackson County's two PSAPs will continue to back each up.
	Network Diagram	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	
	Call-Handling and Aid outside jurisdictional boundaries agreements	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	No changes are being made to existing agreements.
<b>Test Plan</b>		Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	

**Conclusions:**

Pursuant to the 83 Illinois Administrative Code Part 1325.200 g) 2), Jackson County has filed a modification requesting to change its 9-1-1 system provider from NG-911, Inc. to INdigital. The Department has completed its review of the modified plan and has determined that it meets the requirements for a modified plan filing under Part 1325.205.

**Reviewed by:** Stacy Ross  
**Date:** 2/19/19