Network Administration: Configuring B2B Exchanges

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Laura Flack: We're going to start with part two, which is configuring B2B exchanges. We're going to have a bit of a post office analogy to help explain the concepts in this second part of the session.

First of all, I'm going to go through a recap of what we covered in part one. Hopefully, you haven't forgotten that. Then B2B, managing your digital twins transactions. How to configure B2B to route the transactions.

Using transforms. I know in the Tech Talks this morning, Bob spoke about transforms, Burke spoke about transforms, and Caitlin. It was covered quite a bit in the Tech Talks this morning, the idea of these transforms.

Then managing special network situations. For the majority of this session, we're looking at standard integration, but we're going to talk about any special, more complex situations and how that's still possible, and speak about some examples there. Finally, a spotlight on the network success team that's an invaluable team for onboarding partners.

Just to recap from this afternoon session, so we have the three parts to the digital twin, the process networks that create the shared digital space to help you orchestrate the different business processes.

We build and expand that network by adding the partners and linking to those partners so you can exchange the data, and then you populate your shared workspaces by defining user access.

We're going to look at the configuring of B2B transaction exchange so you can send and receive data now across those linked apps. As we saw with linking earlier, linking verifies the address of your partner on the network. It's basically telling TraceLink where to send those messages.

In this way, we can think of managing B2B like a digital post office. The linking defines the address, the postal address, and the B2B configuration sets the special instructions so the vehicle knows where to go in order to reach the end destination properly and the transactions are formatted correctly.

In this way, managing B2B is setting each company's business preferences at the central post hub, which is TraceLink, so that the transactions can be formatted, labeled, and routed correctly, and reach that end destination.

One thing to bear in mind, this is only done for your side of the integration. You only need to worry about your side of the integration. You don't need to worry about your partners.

As mentioned in previous presentations, there is the network success team that helps with the onboarding of partners. We do have that section talking about what the network success team does for your partners that you're onboarding.

It's similar with TTS as well. You go through the integration with your implementation team, and in TTS as well, the network success team looks after your partner's side.

Looking at how to configure the B2B to route the transactions. Just to summarize again, B2B define how each transaction should be formatted, labeled, and routed to reach the end destination. We heard this morning about Integrate Once. Basically, when you integrate on the system once, you're enabling your digital company on the network.

The way you integrate into TraceLink is either through B2B integration, for example, AS2 or SFTP, API, which are TraceLink's link actions or the UI. For B2B integration, this is done once per choreography. What we mean by choreography are the EDI formats, such as EDIFACT, X12, or other like IDoc.

Coming to our post office analogy, these different choreographies are represented by different delivery vehicles for the post office. You're giving the special set of instructions to these different delivery vehicles. As you can see, we have a truck for the X12, a car or a van for EDIFACT, and that looks like a Winnebago to me, but [laughs] that's for IDoc.

You're giving these special instructions so that the vehicles can reach their destination correctly. Throughout this presentation, I am going to show some screenshots of B2B configuration, but not many of them only because their B2B configuration is being reimagined in the next generation of the UI.

At this point, you've integrated your ERP system into TraceLink. You've decided on your own transactions. In order to exchange those transactions, you need to tell the system what happens inbound and outbound.

We are going to use this post office analogy to describe the different concepts in TraceLink. The vehicle needs to know where to go, which door it needs to leave from your company to reach the post office, how to prepare the package, etc.

First, we have the outbound settings. In our post office analogy, this equates to telling the post delivery vehicle how to offload the packages. Then the connection association. This tells all the vehicles which door they're allowed to go to and from.

Then the transform set. As mentioned in quite a few of the Tech Talks this morning, and this tells the post office how to package the message. It acts as a translator to convert the different file formats from one format into the canonical, which is our standard, into the receiving party's desired format.

Finally, we have integration principle, which gives the driver access securely so they complete the task in the post office without needing to be escorted by a security officer. Hold on to those post office analogies, and we're going to draw those similarities, those connections.

First of all, outbound settings. This tells the postal delivery vehicle how to offload the packages. Similar to TTS, you've got the delivery rules, telling TraceLink where to route the messages to. Works in the same way with these outbound settings. You're giving those instructions to the vehicle so it knows where to go. Those are the outbound settings.

This is an example of what those outbound settings look like. For every link, we have the application, then we have a delivery option for every message type, as we see here. That's just one example there.

Then connection associations. We've told the vehicle where it needs to go, the address. It knows where it needs to reach to, but it needs to know which door it needs to go from so the post office can process the package correctly. That's where connection associations come into play. They're really important to help TraceLink route and process the messages properly.

You can associate B2B connections, either at the company level or the location level, so that when you're sending out the transactions, you know that those transactions are coming from the right entity. When you're receiving the transactions, you know that they're going to the right entity.

Again, in our post office analogy, we're referring to the door that the vehicle leaves from your company to reach the postal office. This is an example of a connection

association. In this case, it's been associated at the company level. An example is SFTP, as opposed to an individual location.

Now we're coming on to transform sets. Your partner's expecting to receive information in a certain format, but you really don't need to worry about what format they're expecting to receive that information in. All you need to worry about is telling the system to convert your formatted file into the standard, which is the canonical formatted file.

It's the same thing in TTS as we have today. You have inbound and outbound maps to be able to make those translations between sending party system file formats into the receiving party's format. TraceLink always processes the information on that canonical formatted file.

For our analogy, again, bringing it back to the post office, imagine you are a delivery vehicle that sends your packages in a circular, round package, but for the post office to be able to process that package, it needs it in a square package, or a cube or a cuboid, [laughs] which should be.

Then puts the round package into the square package, but the receiving party system, or the receiving party, is expecting to receive the package in triangular shape. These conversions need to be made, and that's where transform sets come into play.

Different companies do use different data formats and standards. As I mentioned already, the transform map acts as a converter translator. A collection of transform maps is what we call transform sets. It helps you to ensure there is compatibility between your system and your partner system.

You can use whatever file format you wish to use, they can use whatever file format they wish to use. There's never any compatibility issue there because of these transform sets. Here's an example again. For each message type, there is a different transform set in the system. This particular example is for IDoc.

Then on to the last part of the B2B configuration post office analogy, we have the integration principle. We need to give the driver secure access so they can complete the task in the post office. Basically, the postal delivery driver needs to go into the post office without being escorted by a security guard.

Basically, an integration principle in TraceLink terms enables seamless communication and exchange of data between those linked applications. Technically, it's a user object. It exists in TTS today with SOAP codes, but no one actually logs into the system.

It works in the background to ensure this seamless, secure communication between the apps. There is this specific integration access that they have.

Because it is actually a user object, technically a user object, you need to create this as a user with access in the system so they have this integration access in the system. Remember, it's not actually a human. It's just there to have this integration access that's required.

We're going to go on to using transforms, looking at transforms in a bit more detail. As mentioned, transforms transfer data from one format to another, enhancing communication between business parties by allowing each participant to use their preferred format.

I've already mentioned a few times that transform sets convert to this translator in the system. Bringing it back to the analogy again, that's the circle being changed into the square, going into the triangle.

For every B2B connection and choreography combination, there is a different transform set. Again, to go through the B2B connections, we have SFTP, AS2, and the different choreographies that are represented by the postal vehicles. Examples are IDoc, X12, and EDIFACT. If you've got a B2B connection and choreography, you would have a different transform set for that.

This is an example of a downloaded version that we saw earlier of the transform set. If you're familiar with TTS, this is like the inbound and outbound maps in the system. Just note the direction and the catalog.

Bob spoke this morning about catalogs, I think he did. He did talk about the marketplace catalog. Those are globally shared catalogs with pre-built transforms, transforms being created by professional services, partners and customers, and they're available to the public.

Then there's the company catalog -- he did talk about this as well -- that are configured by your company. They're private to your instance. They're not shared publicly there.

Man: ERPA has a certain format. Format can be IDoc, X12, EDIFACT, whatever it is. How do you send data from the ERP to TraceLink? We use B2B connection so that B2B connections can be the data connection which ERP supports, whether it can be SFTP or AS2.

Taking this simple example of ERP uses IDoc format, we created SFTP connection on TraceLink side, and we started sending data to TraceLink. Now, the inbound part is done. Going back to our analogy, the vehicles that leave from our organization to the post office are doing their work.

On the outbound side, you have a partner B. They expect data, maybe in the same format. You saw that. Maybe in the same format, IDoc, maybe in a different format. They have the outbound configured for them.

What happens if your company has another partner, Partner C, and you want to integrate with them? How does the scenario changes? On the inbound side, you're still using ERP. Your inbound vehicle goes through the same path, reaches the post office based on the B2B configuration links and the receiver address.

What we do is the second partner, partner B, was already there. Partner C is also

connected to the network. You can set up a transform set on Partner C. That partner might be using data in X12, X12 format. You set up additional transform set on the partner side.

Why this is important is if you keep on adding partners to the network, your integration to TraceLink, from your company to TraceLink never changes. It's Integrate Once and then Interoperate with Others, based on the outbound file formats.

You set up transform sets on the partner side so that they can start receiving in data, whichever format they need to. You can keep on adding multiple partners. You don't have to change the integration on your side.

That is one of the concepts. Other concepts that we talked about, adding our internal location. A simple example. What if our company, in future, acquires another company? Very common scenario.

If it acquires another company and that company already has an ERP. That is not going to be overnight transition. It will take some time to bring all the companies into same platform. What if that company is using another ERP, which uses, let's say, EDIFACT format? What do you do? How do you exchange data to other partners?

Your inbound vehicle has to change because your company acquired a new company. What you would do is create a new B2B connection, depending on whether they can support SFTP, whether they can support AS2.

Put a transform set here on the inbound side so that the data gets converted to canonical, fed to MINT, and then on the outbound side, partners remains either same or different, depending on their formats. That is the true power of Integrate Once, Interoperate with Others.

As long as you can have one format that your company supports, you can have

multiple formats. Acquired company, different formats, that also you can configure. That is why the transform sets are so powerful.

If you think in terms of analogy, if you keep on adding more vehicles that leave your door, the only responsibility of postal office is to manage their internal processes. It does not depend. You don't need to change anything from your side, rather than additionally having a transform set and creating a B2B connection.

They will manage their operations better. That is what transform set does because data gets converted into canonical, they work on that canonical, and then start sending data outbound. Transforms are very powerful tool which truly helps us acquire this concept of Integrate Once and Interoperate with Others.

Laura: Actually, you did go through the [laughs] complex situations. Just to recap, we looked at standard ones, but maybe some mergers and acquisitions. It really depends on whether you're using the same B2B protocol, like SAP, or different B2B protocol.

If you are using the same B2B, it's very straightforward. You would just add your location to company master data, and TraceLink would know that that location is associated with your company and knows that those identifiers are part of your company. That's pretty straightforward.

Then with the more complex situation, if you've got a different protocol, ERP or file format, you need a new B2B connection for that choreography. You've got different file formats, and so you'd have different door that it needs to go through. It's got the different connection association.

The main point to drive home for that is that all of these situations are possible. These changes would just happen, and your process of exchanging transactions with your partner remain efficient and seamless. Configuration happens on your side, but that transaction exchange is not affected.

Finishing today's session with a spotlight on the network success team and services team to help manage your digital twins. I know they spoke a little bit about the network success team this morning. They've always been with TraceLink, our NSMs, and they've always supported your partners.

It's slightly different now, though, because traditionally, NSMs are available during the implementation phase of your project. Now they're available after the implementation phase as well.

If you ever need to onboard a new partner, you can reach out, you create a case. I'll show you how to do that in a moment to contact the NSM team. That bypasses support, so it goes to a separate queue there.

The way you would do that is go to your support page and then request trade partner onboarding. Like I said, this bypasses the support queue and goes straight to the network success team. If you're onboarding a partner that already exists on the network, the case will be assigned to that existing network success manager for that partner.

If the partner is not yet available on the network, it will go to our network operations team that verifies and adds the partner to the network before the partner is assigned to a dedicated network success manager.

Some key takeaways, B2B configuration provides the system with those special instructions so TraceLink knows how to get those transactions to the end destination in the correct format and deliver the data properly. We use that post office analogy to describe the different concepts there.

Transforms are really important to help the system or to enable the system to convert one file format into the canonical to the desired format of the receiving party system.

Then finally, our network success team and services team is going to help you.

With your side of the integration, you have the services team.

[background music]

Laura: With your partner's side of the integration, you don't need to worry about, we have the network success services that help with that side of things.