



**NCSBN**  
Leading Regulatory Excellence

## **NGN/CCNA Webinar – March 2022 Video Transcript**

**©2022 National Council of State Boards of Nursing, Inc.**

### **Presenter**

Jason A. Schwartz, MS, Director of Outreach, Marketing & Advocacy, NCSBN

- [Dr. Quinn] Hello, everyone, and welcome. Thank you so much for taking time to join today's webinar. On behalf of the leadership and staff at the Center to Champion Nursing in America, I thank you all for taking time to join us for this important discussion. The Future of Nursing Campaign for Action and the National Council of State Boards of Nursing are happy to bring today's webinar focused on Next-gen National Council Licensure Examination, otherwise known as NCLEX.

For the past several years, the campaign has worked with minority-serving schools of nursing from historically black colleges and universities, Hispanic, and American Indian Alaska Native serving institutions who enhance and/or establish mentoring programs that help students remain in school, graduate, and pass their NCLEX. With the upcoming release of next-gen NCLEX, many of these schools have expressed the need to learn more about the exam to adequately prepare their students.

We are delighted, really just delighted to co-sponsor today's webinar with the National Council of State Boards of Nursing, who so graciously agreed to offer this webinar to support our efforts and your efforts with minority-serving schools, and our overall goal to increase diversity in nursing to help achieve health equity.

Before we go further, I want to mention we are recording today's webinar. If you miss a section or would like to pass it on to a colleague, which we very much encourage you to do, you can find the recording by going to [www.campaignforaction.org/webinars](http://www.campaignforaction.org/webinars). And now I have the honor of introducing today's presenter and expert on the next-gen NCLEX, Mr.

Jason Schwartz, who is the director of Test Development and Examination at the National Council of State Boards of Nursing. So thank you for joining us today Mr. Schwartz. Please, take it away.

- [Jason] Well, thank you very much, Win. Thank you, everybody. It's really an honor for me and a pleasure to be part of such important work and with such distinguished guests and attendees. So we will jump in because I brought a lot of material if that's okay. I am going to talk fast through the things that are nice to know and go slower for the things that you really need to know.

So I call this Countdown to Launch for the Next Generation NCLEX because the next generation NCLEX is now just barely over a year away. April 1st is our launch date. April 1st of 2023 I should clarify. I hope nobody took that as 2022. At any rate, here we go.

Countdown to launch. We start with some legalese. If you see something, share something that's why we're here, that's why I'm here. The whole point is if you see something that would be beneficial to your colleagues, or even your students, please do share it. You'll have copies of the slides and all of that I promise. If you see something that you'd put to commercial use to sell, we have an email address at the bottom of this slide to just check with us first, that's all we ask.

So with that, what am I covering today? We'll go quick on where we are with the next generation NCLEX and essentially, why we're making changes to the NCLEX. From there, we'll spend, I'm going to say ample time for the bulk of the presentation looking at the kinds of new test questions that your graduates will see on the exam. And good news or bad news depending, what you came to do today, we are turning that into a hands-on activity as well.

So I'm going to be showing you the new content, and then you are going to be working with me to develop new content. What else? We have what we call the test design. I'll explain what that means later. But it's stuff like how many items are on the test, did the test get longer, did it stay the same size, these sorts of things, scoring.

And again, I've brought some hands-on activities for all of you to really get involved and demystify the scoring approaches that we'll be using on the exam. Finally, I'll point you to the resources that we have on our website, which can be very helpful. And I've tried to allow some time for questions at the end as well. Let's jump in.

We've got a lot to cover. First, the timeline. So I've been doing presentations like this for I think four years now and this slide is in every single deck. The only difference is where we are. We used to be on the second or third box well, gosh, now we're on the sixth and seventh box and quickly approaching the eighth box. I won't go into all the boxes here unless I get stuff in the Q&A.

I'll just indicate that many people first heard that the exams were changing oh, around 2018, 2019 maybe 2017 if they were really, really looking for this kind of information. But we began this work in 2012, literally 10 years ago. We've been working on this for 10 years. Other key data, of course, is the launch, April 2023.

And this is the first audience to know that it's not just April, but April 1st, we made that decision I think just in the past couple of days. So, foundations, where did this exam come from? Why are we making these changes? Well, like a comic book character, there's an origin story. So we have something, it's a meeting essentially, called the NCLEX Examination Committee Meeting.

And these are regulators from different states who have governance or oversight over the NCLEX. And a very consequential question that was asked in 2012 was, is the NCLEX measuring the right things? Sounds simple? Well, we conduct a practice analysis, a scientific study every three years on exactly what entry-level nurses, RN level and PN level, are doing at the job, right?

We collect data on frequency, data on criticality, and that's how we figure out what to put on the test. But there's a catch, right? There's always a catch, isn't there? There's a catch which is that sometimes there are things that you care about that you'd like to measure, but you cannot measure.

I'll give a simple example if it's okay to take y'all back to English class in junior high or high school. You probably had a teacher who cared very much if you could write an essay, a short story, a poem, etc. However, at the end of the year, if that teacher only had a multiple-choice test, you would not be tested

on if you could write an essay or a poem. Doesn't mean the teacher didn't care, it meant the teacher was limited by the testing instrument.

Well, that was us. But what we decided to do...and spoiler alert, I am leading into clinical judgment right now. What we decided to do is pretend there were no barriers, pretend that we could test anything we needed to test. And if the technology and test instrument and item types didn't support that, well, maybe we could change those things.

So we began two things. And I'm collapsing about five-ish years of research here into about 5 to 10 minutes in the interest of time. But at any rate, we did two things, a literature review, and a special practice analysis that we called our Strategic Practice Analysis. Let's start with the lit review. And this is information as educators that will not be at all a surprise to you.

Well, even back in 2012, education had already changed, right, to incorporate more clinical judgment, decision making, critical thinking, etc. Education was already there. Our NCLEX wasn't quite where you were, I think, but education was definitely there. But what was going on in practice?

Well, data showed us 50% of new nurses were involved in errors with just about two-thirds connected to clinical decision making and judgment. And only 20% of employers were satisfied with the clinical decision-making skills of their new hires. What does this all add up to?

Well, it means clinical judgment is critical for patient safety and public protection, but there's a key phrase, even at the entry level. Something to note, the NCLEX is not an exam of advanced nursing for very experienced master nurses 10 years in practice. No, no, no, it's a gateway to begin a nursing career. Therefore, if clinical judgment were important for nursing but not yet at the entry-level, it wouldn't have made our cut.

But even at the entry-level critical to patient safety and public protection. You see the numbers right here. And so the question then is, can we test it and how? Well, before I get to that, I will show something that was a companion piece to our strategic practice analysis but it seemed for a lot of audiences, more interesting to look at than to read a very dense research report, although you can do that too.

Let me show the picture. It might look like a spider web or something. But I'm going to pretend it's a clock and let's say from 12:00 to 7:00, you see 63 nursing skills. You can think of a nursing skill like therapeutic communication if you like. For 7:00...oops too soon. 7:00 to midnight, you see 41 nursing tasks.

And so I'm not a nurse, my own background is mathematics and testing so my examples aren't always solid gold. But we'll say the nurse doing something related to an IV, you know, perhaps would be one of these tasks that was observed. So during the strategic practice analysis, what was of particular interest was the connection between the skills and the tasks.

For the tasks observed, what skills were needed? Well, in kind of a typical picture, a particular nursing skill might have attached itself to 5 tasks, 5 to 10 was a pretty typical number. I'll just walk you through a few. This one is a little more like 10. This one is back to around 5. This one's back to around 5. This one's more like 10, right?

You get the idea. Well, sometimes they're a little funny this one only got one. But skill 33, clinical judgment, my gosh, 34 out of 41. In other words, clinical judgment was an important skill for just about everything that nurses were doing. So that was the highlight of the strategic practice analysis. Question then, how do we measure?

But first, let's sum up where we are so far. Clinical judgment, important, necessary, even at the entry level. We know that clinical judgment can and should improve with experience but you can't start at zero, right? If you start at zero, there are implications to patient safety. Number two, well, today's NCLEX, does it address clinical judgment?

Yeah, a little. We have some items related to prioritization, we have some if you were to go into the Testing Center, you know. We don't really let you in as an observer but pretend. If you were to go in there and you watched an entire test you'd see some where you'd say, oh, there's some clinical judgment there. But the point is, it's indirect, it's limited, it's not comprehensive. The item types we use on the test today, don't get us far enough.

So if we want a more direct evidence-based measure of clinical judgment, we need a lot more research and some new item types. I'm going to highlight a phrase. I like to highlight some key phrases here. What is the NGN? What are we trying to do?

Well, all the changes I'm going to describe for you are all about adding direct evidence-based measures of clinical judgment onto the exam. This is something critical to patient safety and public protection and we now can test it. So we need to test it. So, we talked about how do we measure it?

Well, I'll tell you, but let me give a shout-out. In the upper right-hand corner, you see an NGN newsletter thumbnail. And every topic I cover with you today, there is an NGN newsletter that goes into even more detail. So if I go too fast, if I'm too confusing, if my examples aren't very good, you'll see the reference to the newsletter that does, I'll say, as good a job as me.

I don't like to say a better job, right? I'm going to deliver too. But the point is, you can supplement everything you get from me with these newsletters. So jumping right in, you see here our Clinical Judgment Measurement model. We needed a framework for measuring clinical judgment.

When you're doing something like a test, clinical judgment is sort of big, amorphous, blurry, difficult, complex. We needed to break it down into smaller pieces that we can test. In particular, if you're interested in the test items like I am, and I bet all of you are, it was this layer three where the magic really happens. I would encourage you to read the newsletter on the entire model.

But this layer three is where the items are written. I'm going to blow it up a little bit because these six boxes Recognize Cues, Analyze Cues, Prioritize Hypotheses, etc., these are going to come up again and again, in my presentation. Today, this is really where I'm putting my focus is showing you the new test content and connecting it to these six boxes so that you understand what do we mean by these six things, right?

And what might other items look like, even ones that I'm not showing you today? So we're going to jump into that content. Before we do that, I just want to sum up some things about the Clinical Judgment Measurement Model, always a mouthful so sometimes we say NCJMM. But that's also a mouthful, isn't it?

At any rate. So it is designed to test clinical judgment and decision making in a large-scale, high-stakes setting. I bolded those because that's us, right, that's the NCLEX. Over 300,000 candidates a year take this test at testing centers, at computers, right? Well, that's terrific but it also puts limitations on us. If you're educators, you might talk one on one with a student, you might talk to a small group, or you might talk to the whole class and ask certain questions and almost have discussion and get a sense of...

- [Woman 1] It's just more like shampoo and conditioner.

- [Woman 2] No, no [inaudible].

- If possible, let me ask for mute for the attendees. Thank you. So point is you have more ways than I do to get a sense of clinical judgment in your students. But in the large-scale, high-stakes setting, we needed a valid and reliable way to do it that really just had a person at a computer.

So large-scale high-stakes that's what we were doing. I mentioned it supports the item development and especially that layer three. But also, I want to say something that we did not do. Because early on, I think as we started to put out information about the changes coming to the exam, until we had all the information to share, I think some folks kind of connected the dots, and that made sense to me, but wondered if we were somehow at war with the nursing process or various models of pedagogy and things like that.

And so I want to emphasize, definitely not what we're doing or what we were trying to do, I would use the metaphor of a highway that had two lanes with successful scholarship and theory in terms of the science of nursing or the practice of nursing, and the teaching of nursing, maybe being a second lane. We weren't trying to cut in, merge tell anybody, they were going the wrong way, or going too slow.

Rather, we were carving out a third lane. It had no cars in it yet, which was all about large-scale, high-stakes testing of clinical judgment. That was us. So let's take a look at the content. There are two different ways that we'll be measuring clinical judgment on the next generation NCLEX. The number one way and the biggest change coming to the exam...

if the attention span is going to be overwhelmed after just one part of my presentation, save it for this, case studies, this is the biggest thing to know well, the case study. But we also have a second way that we'll be measuring clinical judgment rather than a case study, which is a set of six items that are all connected together.

We also have items that can just be one at a time, a single item that gives us a little bit more clinical judgment measurement. I will show you each of those. We call one of them a Bowtie item and one of them a Trend item. So with that, let's jump into the case study. We have our 2020 newsletter, which focuses heavily on this. And I would encourage it, if there's one newsletter to read, this would be the one, although I encourage all of them.

So sample case study, this is literally what the screen would look like for your students when they graduate. Let's take a look at the anatomy of the screen real quick. Over where I put the number one case study, screen one of six, what does that do? It is alerting candidates that hey, this is a case study now, and it's kind of a "you are here." Because you can imagine as they progress through the case study, eventually they'll see things like screen five of six, right so they'll always know where they are.

On the left-hand side, we've got a lot of stuff. But let's start where I put the number two, it's just a one-sentence lead in. It kind of sets the table, right? Maybe it says the setting or gives a very brief description of the client. Okay, 3, 4, 5, 6 go together a little bit. I bet most of you, if not all, are familiar with what we call the exhibit item type on the NCLEX today. Well, this is kind of a carryover from that.

Our case studies use a tabbed format to present information to the test taker. So here we go. Is it always four tabs? No, in fact, you're going to see one, I'm going to show it to you in the one we do together that starts with only one tab, right? Well, if it starts with four tabs, is it four tabs the whole time?

Not necessarily. A fifth tab could be added partway through the case study. So there's nothing sacred about the number of tabs. The point is we use a tabbed format to provide a lot of information about the client. So let's go over to the other side of the screen and that's where we put the question or in my business, we say the item.

With that, I want to emphasize, your graduates will always have access to the entire screen, they will have access to all the tabs no matter what item they're on. For the benefit of our eyes, especially mine, needing to read the small print, I am going to be focusing on half the screen at a time.

Trust me, with my vision, you wouldn't want it any other way. So the other thing I'm going to do because I know some of you joined on your phone, and some of you may even be driving, I sure don't want you to read this while you drive. I am going to read all of this to you. And I may mispronounce a few specialty terms, but let's go.

The nurse is caring for a 17-year-old male client who reports a recent injury to the left thoracic cage. History and physical tab. Client reports injuring his left ribs after being struck by mechanically pitched baseball in a batting cage last week. He has significant bruising, feels lightheaded. Also reports intermittent pain in the left shoulder.

Denies shortness of breath, has some discomfort in the lower-left, pardon me, the left lower chest when taking a deep breath. Reports feeling abdominal fullness, occasionally nauseous. No significant past medical history. Surgical history includes arthroscopic repair to the left shoulder for a torn rotator cuff last year. He has not felt well enough to attend baseball practice since the injury. Well, that was a lot of information.

But guess what, there's more. Nurses notes. Let's go. Patient appears pale, slightly diaphoretic. Large amount of bruising noted along the left torso and over the LUQ of the abdomen. Patient is guarded. There's tenderness upon palpation, dullness to percussion over the abdomen.

Slightly diminished breath sounds on the left, productive cough noted. ECG shows normal sinus rhythm. And there's more vital signs. BP 90 over 50, pulse 116, respiration is 24, temperature 97.8 or 36.6 for our Canadian friends, and oxygen 98% on room air. Almost there.

Lab results, hemoglobin 9, hematocrit 27%, white blood cell count 19,000. I want to indicate here you may see on your screen, if you're not driving, reference ranges. That's a little bit new because you probably know today, candidates are expected to have memorized reference or normal ranges for various lab values.

Well, one of the things we're doing with next generation, we are trying to be more authentic, right? Well, more authentic is if 99.9% of the time when a lab result comes the reference range is printed right next

to it, well, we are going to provide it in the name of authenticity. So that may be good news for students and educators.

All right, let's keep going, we can finally come to the questions. So you probably noticed it took me a while to read all that. Definitely right? And that's a good thing because I think sometimes if you just skim it, you lose sight of just how much information there is, right? It's a lot of information.

And what are we trying to do? Well, when the nurse educators like yourself come in and write these scenarios, we say to them, we want realistic, right, which can include things that aren't even super important, like maybe the baseball mechanically pitched, do we need to know that? I don't know, right? But that's real-world, you get all of this information. I think studies show that a nurse walking into the room may encounter thousands of cues, some of them might be pretty irrelevant, like the color of the wall or the carpet, right?

But some of them might be entries in nurses' notes, or a particular lab value that isn't particularly exciting at the moment, right? Well, somehow, because we know the nurse cannot respond to all 1000 plus at the same time, somehow the nurse has to be able to say which are the most salient. Where do I start?

What are the things that really jump out here, right? It can't be everything. So let's take a look in that spirit at the first item. Drag the assessment findings that require immediate follow-up to the box on the right? So again, the test taker still has all those tabs on the other side of their screen. We don't because I wanted it to be bigger, that's all.

But anyways, what kind of item type is this? Today on the NCLEX, we use a format called drag and drop. Well, this is also drag and drop, but it simply has more choices. So we call it Extended Drag and Drop. That's going to be a theme you'll see. I mentioned that the item types we have today weren't really sufficient for a strong measurement of clinical judgment.

In some cases, if we just added more choices, or put a little twist, it sort of got over the hump. So you'll see some item types from me that are extensions of existing item types, but you'll also see some that are brand new. Okay, so here's extended drag and drop, what's going on drag the assessment findings that require immediate follow-up to the box on the right.

And we see things like productive cough, the blood pressure. Oh, gosh. Okay, it looks like I was temporarily muted. So I will go back into drag the assessment findings that require immediate follow-up to the box on the right.

Productive cough, vital signs, intermediate left shoulder pain, etc. So in terms of that clinical judgment measurement model, what is really going on here? Well, that first box at layer three we call Recognize Cues. It is all about here is a lot of information, including information you probably don't need. Well, what are the things you really need to pay attention to right now, right?

Can you distinguish relevant from irrelevant? Can you distinguish now from later? Can you distinguish critical from good to know, but not critical? These kinds of things. You may notice we didn't ask, what do they mean? Why are they important? And it's not because we don't care or we don't consider that critical judgment, it's simply because that's the second box, not the first.

So in the first box is about recognizing or identifying these cues. When we get to the second item, it's a little more about interpreting or analyzing. So let's take a look at the second item in the set. And again, the test taker has all that information available on the other side of the screen. Nurse is reviewing the client's health history and medical record. Drag each potential issue that the client is at risk for to the box on the right.

Well, I bet you recognize the item type because it's the same as the one before it, we call it Extended Drag and Drop still. Okay, well, what's going on here? We have identified or recognized the very salient cues that require the attention of that nurse, right. But now it's a little bit more about what could they mean, how do they connect together, right?

How does the puzzle sort of fit together when we see these cues? That's what's going on here. In our model, we call it Analyze Cues. So it's a little bit more at the meaning or connections among those various cues. Okay, we are now approaching half time, in the case study, we've made it to item three, and we see an item that does look quite different from anything on today's exam.

The nurse is initiating the client's plan of care. Complete the following sentence by using the list of options. And we see here, the nurse should first address the client's... And we have this pulldown menu with three choices like abdominal pain, respiratory status, and lab test results, followed by the client's... And then guess what the second menu is actually the same as the first.

So I'm showing you one open I guess, and one closed. But anyways. So it's essentially what should we do first, what should we do next? This item type formally, right, for testing professionals, we would call it a Cloze Pull-down Menu, and that's cloze with a Z because it's a German term. But I'm happy enough just to call it pull-down menu that's what it looks like.

And I think you'll be okay calling it that. So it's a pull-down menu item. But what about in terms of the Clinical Judgment Measurement Model? Well, clearly the nurse here is prioritizing. And our third box is all about prioritizing. Our full name is Prioritize Hypotheses.

But I want to emphasize for this group that things can come in two different flavors. Sometimes we're prioritizing hypotheses. Oh, what's most likely happening here, for example. But sometimes I call it prioritizing conditions. If you read this first sentence evaluating and ranking hypotheses or conditions according to priority, well, if we go back to the previous item, we can see we're kind of prioritizing conditions or aspects of the client's situation, it may feel more like that than hypotheses.

So again, two flavors. What unites the two? Prioritization is always step three, we're prioritizing. Okay, we now get to the second half. Now a little, I'll call it a teaching tip. It's unofficial, you can take it if you like it, you can discard it if it's just too much information. I think of a case study as having two halves.

The first half of the case study is the thinking half. Okay, wow, look at all this, what's going on? That kind of thing. The second half is a little more action-oriented or intervention-oriented, it's more the doing half. So there's a thinking half and a doing half. But of course, even in the doing half, we're still thinking, right, because it's clinical judgment, clinical decision making, right?

You can't do clinical judgment without some thinking. But the point is, we sort of transition into the "what are we going to do about it" phase of the case. So here we are with the fourth item. The nurse is speaking with the physician regarding the treatment plan for the client who was just diagnosed with a

splenic laceration and left-sided hemothorax. So, tip for educators, sometimes candidates feel like they can skip the directions, right?

The directions are just fluff, extra reading, waste of their time. Well, gosh, we just put the diagnoses here. So discourage skipping the reading. We try not to waste their time with super long directions but if we put something, it is worth reading, I would say.

Okay, now let's get to what do we do? For each potential order, click to specify whether the potential order is anticipated or contraindicated for the client. Well, gosh, we can see here an item type that is not on today's NCLEX, it is brand new for the next generation NCLEX. We call it a Matrix or a Grid. It's where you put your answers into rows and columns.

So simple enough if we just take it one row at a time. Potential order echocardiogram, well, would we anticipate that or would we see that as contraindicated? Okay, how about IV fluids? How about abdominal ultrasound, preparation for surgery, serum type, screen, etc. Okay.

So I think you get how the item works. What's going on? Well, it's all about thinking about the client needs and asking ourselves as the nurse, what kinds of things might help, but also what kinds of things wouldn't help and might even make things worse, right? So in our clinical judgment measurement model, we're on the fourth box out of six at layer three, we call it Generate Solutions.

And what I showed you, I think, is a really nice example of that. It's all about thinking about what we're hoping to accomplish, what the goals might be, and what ingredients in the plan of care might get us there. It doesn't mean we're going to or that we can do every single one of them. But it just means hey, these things at least are worth considering. And oh, by the way, here are some things we probably should avoid.

Okay. We haven't yet decided exactly what we're going to do. Short story, when we started doing our writing and review panels for the next generation NCLEX, we had very experienced educators and very experienced clinicians, and they'd read the scenario without even looking at any of the questions, right. They'd say, "Oh, I know exactly what we need to do. We need to request an order for you know, an IV of whatever, and do this and prepare for surgery."

And that is experienced nursing in action, right. But how did our participants know these things? Well, ultimately, there was evidence in the case in the scenario, right, there were cues that they recognized, analyzed. They had hypotheses or conditions that they prioritized. Instead of having to make a long list of possible interventions, kind of jumped to the right one.

But you get the idea. It sort of sped up our process because, with experience, that's what happens. Okay, let's go to the fifth item in the set. The nurse has been asked to prepare the client for immediate surgery. Okay, so we're a little closer to exactly what we're going to do here. Which of the following action should the nurse take? You all recognize this item type.

It's essentially a select all that apply. In my world, we call it multiple response. But you can see that there are extra answer choices therefore, I call it Extended Multiple Response. If you like, you can call it extended select all that apply, right? It's the item type we use today, but with more options.

So what's happening here? Well, we're very focused on what to do, that is our fifth box, which is Take Action. Again, for this group, I want to emphasize two flavors of take action, right? Educators always

tell me, "Jason, we'd rather you be comprehensive, even if it's a little confusing, than leave out information we need to know just to keep it simple." So here I am, I'm going to be complicated because I think ultimately, you want this information.

So there are two flavors of take action. The first flavor is kind of like what you see here. It's basically, what are we going to do, right? It's a what or a which sort of question. The second flavor of take action is how, how are we going to do this? Now educators are quick to tell me that how questions really are often memorized procedures.

The textbook already says how to do it. First, you wash your hands, then you open the box facing a certain way. Then you take out glove number one right, you know, tried and true step-by-step processes that students memorize. However, on the next generation NCLEX in a case study, if there is a how it means there is something non-routine here, a little bit of a curveball to keep with the mechanically pitched baseball analogy here.

What do I mean by that? So pretend that somewhere in this scenario, there are cues that suggest the client may have difficulty swallowing. But pretend that they need a medication that's usually administered orally. Well, the how isn't just give them the pill and tell them to swallow it, right?

It's a little different. I don't want to pretend that's a super hard challenge for nurses but you get the idea. If there's a how it connects definitely to information in the scenario. When we pulled our item review panels if there's a how we say, hey, tell us if this is a memorized procedure, then we don't want it, right.

We want to make sure that the how involves clinical judgment. Ready for the sixth and final item in the case study? Pay careful attention because you are going to be writing some of these with me, believe it or not, in just...I think in just a few minutes. So here we go. Final item in the set, click to highlight the findings below that would indicate the client is not progressing as expected.

And the way this works, just like it says, is I can click on something and it highlights. I can click on something else and it highlights. I can click again and it unhighlights if I change my mind. But the point is we are literally highlighting. Good news. The student, the graduate, the test taker, doesn't have to spend any mental energy deciding do I just say refusing to use the spirometer?

Do I need to include stating it causes pain? Do I say the client is. No, we have pre-programmed these. If they click on any part of the correct response, or even the incorrect response, if they click on any part, they get the whole thing. So they don't even have to decide word by word, they just need the basic concept here. Okay, well, what's going on?

The name of this item probably won't shock you. We call it a highlighting item. In terms of Clinical Judgment Measurement Model, this is all about evaluation in the nursing process, or in our model, we say evaluate outcomes, right. So typical evaluate outcomes is we essentially have a before and after of our client. The before is kind of when we first showed up as the nurse.

The after is after some interventions have been performed. Well, we had a bunch of findings before, we get some new findings after, right? And we need to be able to recognize, okay, are all these good news? Are any of them bad news? Do some of them indicate that an intervention might have been ineffective? Do some of them indicate maybe I should have done something else, right?

So evaluate outcomes is how all of these finish. So congratulate yourselves, you made it through the absolute most dense part of this presentation, which is to get through an entire case study, not just to look at the questions, but to connect them with the Clinical Judgment Measurement Model, right?

We got to connect those dots. So key features of the case study real-world situations, we require that of our item writers. Educators, just like you give us real-world. Okay, well, that always includes some information that the candidate will not need, right but that's real world. Real-world nobody ever says to you, as the nurse, here are the only three things you need to know.

Now you know what to do, right? Well, real-world, you've got the notes from the prior nurse, you've got, you know, any sort of visual or physical assessment that you've done, you might have vital signs, hopefully, right, lab results. Yeah, all this information, some of it you don't need right now, that's real life. Okay, two progressions, one a progression through time.

This isn't just a snapshot of the client right now. I mentioned the before and after. In some case studies...in fact, there's one I presented a couple of weeks ago, where we followed the client around for three weeks because they came back after two weeks for some sort of checkup or something like that. But the point is, we are following the client through some significant amount of time where they walk in one way or were brought in one way, interventions happened, they now are a little bit different, right?

This takes time. But also it was a progression in terms of our layer three of the Clinical Judgment Measurement Model. Here's what I want you to know, here's an important takeaway. You may have just looked at this case study and said, oh, boy, some of these items are a little bit complicated.

I'm not going to differ with you, right? And clinical judgment, in some sense, almost requires complicated situations. However, what I don't want you to walk away with is oh, wow, the case study is a whole bunch of random complicated questions. Yikes. Don't think that. It is always six questions. They are always in the order of those six boxes, starting with recognize cues finishing with evaluate outcomes, right?

So not random at all, right? The first question always is here's a lot of information. Pick out the things that matter right now, right? It may be worded different but essentially, that's it. The second question is always, okay, why do we care? Or how do these things fit together? What do they mean, right?

Some level of analysis. So definitely not random. Those six boxes in order are the blueprint for every single case study on the exam. What else? Well, you saw this, a range of content knowledge. To do well in that case study, to do really well, you would need to know a lot of different things, right? In a multiple-choice item, you might get lucky and know the one thing that's needed, but in this case, to do really well, you need to know a lot of different things.

You saw some new item types. And again, they came in two flavors. Some were just extensions of item types we already have such as extended multiple response and extended drag and drop. Others were genuinely new item types for this exam. You saw the pull-down menu, you saw highlighting and you saw matrix or grid.

So here we go. We are going to try one together. If you have already downloaded our spring 2020 newsletter turn it upside down because the answers are in the newsletter. I have taken a sample from that newsletter and turned it into an interactive exercise. You will be using the chat, which by the way, I can see is super active.

I'm going to get to these questions, I hope all at the end. But for now, we're also going to use the chat to complete this item set in a nice interactive manner. Feel free if Zoom lets you to like or comment on other people's ideas or if not, just use the chat for your own ideas.

Okay, let's go into it. So we have a new scenario, again, in case you're driving or on a small screen, I will read it. The nurse is caring for a 78-year-old female in the emergency department and there's only one tab. I mentioned before we had four tabs. That's not a magic number, could just be one. Okay.

Client was brought to the ED by her daughter due to increased shortness of breath. You're probably thinking COVID already. This was written even before the pandemic. So anyway, but okay, increased shortness of breath this morning. Daughter reports the client has been running a fever for the past few days and has started to cough up greenish-colored mucus and to complain of soreness throughout her body. Client recently hospitalized for issues with afib six days ago.

Client has a history of hypertension. Vitals are 101.1, 92 pulse, 22 respiration, blood pressure 152 over 86, pulse ox 94 with two liters per minute via nasal cannula. Upon assessment, breathing appears slightly labored. Coarse crackles noted in bilateral lung bases.

Skin slightly cool to touch, pale pink in tone. Pulse plus 3 and irregular. Cap refill three seconds. Client alert, oriented person, place, and time. The client's daughter states "Sometimes it seems like my mother is confused." So that's our information. Now, let's recognize cues item together.

Rather than giving you a blank sheet of paper...and by the way, I have a training. We call it our Action Model Training. But it's a long training, it's roughly a half-day training which I'm always willing to do. But the point is, I don't have a half a day for you right in this one. So rather than start you with a blank sheet of paper, pardon me, we are going to start with an item mostly written and we are going to essentially fill in the blanks.

So we got all that information about the 78-year-old female, drag the top four client findings that would require follow-up to the box on the right. So we see an extended drag and drop. And let's now think like an item writer since that's what we're doing, right? Less like a nurse, less like an educator, more like an item writer. Well, we can tell the logic of this item is that we need four correct answers and two that are incorrect.

So we are going to use the chat here. You tell me, type in, just give me one for now. Productive cough, okay. Dr. Gina is already on it. Fever.

Oh my gosh, you guys get the drill I didn't even finish my direction. But no, you got it. Tell me something. Anything in the findings, anything in the scenario that you believe requires immediate follow-up? We're focusing only on correct ones right now, okay. Yeah, I am seeing all kinds of things. Greenish sputum, confused, crackles, yes, okay.

This is an amazing group. This group just set a record. Oxygen saturation, love it. Okay, now, take a quick break. We're going to make a quick shift. We need our item to have wrong answers. In other words, if I just took six things that you told me, that would be a weird item, because it says drag the top four, but we don't want them all to be tied for first.

So now find some things in the scenario that don't require follow-up. Do I have some information here that doesn't require follow-up? And be careful. We prefer for it not to be too obvious, right? Example, let me see if I see something here.

Yeah, alert to person, place, and time may be a little bit too obvious, right? That just sounds great. Or if it ever said you know, breathing is normal, that might not be a great answer choice because it's too obvious. But what am I seeing? Cap refill, soreness, yeah, alert, oriented.

I am seeing terrific things. History of hypertension. Beautiful. This group gets it. Okay, here comes the big reveal. But I need to emphasize, when I show you what the item writer came up with, it doesn't mean it's better than yours, right? It definitely doesn't mean it's better.

It might be different, although what you're going to see is that a lot of what you suggested, in fact, is what the item writer went with. So fans of "Family Feud" in the audience depending on your age, I'm either Steve Harvey without the funny jokes or Richard Dawson without the kisses. I am now going to reveal survey says and here's what we got. Vital signs, lung sounds, cap refill, orientation, radial pulse characteristics, and cough characteristics.

That's what the item writer choose. Now, let me emphasize, in case you write one of these yourself ever, right, the way to approach the item logically, I believe, is to write the four right answers, and then write the two wrong answers, right? You know, think logically, right? Break it down into the two parts.

We need some keys, and we need some distractors in testing language. However, in your final form, don't list them in that order or everyone starts to figure out oh, the first ones are right, the last ones are wrong, right, you don't want to do that. So we like to shuffle them. And you can kind of tell looking at the choices here, we've shuffled them from shortest to longest, right? So the correct ones could be anywhere, the incorrect ones could be anywhere.

Great job, this group. Guess what, though I have five more and some of them are even a little bit more complicated. This one is a really cool item type. It's a use of our matrix grid in a little bit of a novel way. Let me move things over so I can see the whole thing. Well, here's what it says. for each client findingt below, click to specify if the finding is consistent with the disease process of...

and I've covered up what the item writer went with. But they've listed three conditions, right, three conditions. So we're going to put our focus there first. So in the chatbox, tell me some conditions...it doesn't mean the client definitely has this, right. And we know that's not the role of the nurse anyways.

But what are some things where at least some of the cues might have something in common with the condition you type in? I'm seeing pneumonia. I love it. Okay, I'm seeing a lot of pneumonia. What else do I have? I have CHF. I will be honest and say I'm not sure what that is, but I'll take it.

Okay. Sepsis. Okay. Let's see aspiration. Okay, so I'm seeing quite a few things. Looks like septicemia if I'm reading that right. Plenty of pneumonia.

I think pneumonia is really jumping off the page for this group. And I think the item writer went with that as well. So let me reveal. Oh, COPD, okay. RSV, right. These days, I might say COVID. But let's see what the item writer went with.

Pneumonia, UTI, and influenza. Congestive heart failure, okay, that's important for me to know. Thank you, Brandy. Okay, so that's half the item is these headings, right? What are some diseases or illnesses that would be interesting to consider against the client findings right? Well, what are some client findings that we'd be interested to bounce up against these conditions, right?

So here, it's a little bit of a free for all, because we've got five things, and there's sort of the notion of a key or distractor is a little different than usual because you're probably going to find something that ends up being right for let's say, two of these conditions and not right for one. So things are a little blurrier here. But what are some findings where it would be interesting, you'd want to know.

Do my students connect this symptom or finding with pneumonia? Do they connect it with UTI, right? It doesn't have to go with all three, it doesn't even have to go with any. But what's interesting, fever cough, abnormal breath sounds, pneumonia. Yeah, okay go with pneumonia, body aches, elevated temperature, labored breathing. Okay, this group is doing a great job.

Abnormal sputum. Okay, I like it. SAT, I'm guessing the oxygen. Okay, good. Let's see what the item writer came up with here. Okay, UTI would be good for fever and confusion. Excellent.

Confusion would be a great choice. Fever would be a great choice and would probably check off all three illnesses. So let's see what the item writer did. Much of what you've mentioned, I think fever, confusion, soreness, cough, and sputum, shortness of breath. Beautiful. I think you all pretty much wrote the same item in a way. So this is nice.

Nothing magic, by the way about the number of rows. If you said, oh, gosh, I had a sixth client finding I really, really wanted. Hey, great, add it, add it to the list, it's okay, right? Or if you said, gosh, this is a really great question to ask for pneumonia and UTI, but it's not a good question for influenza. That's okay, get rid of influenza, you know what I'm saying? So these templates that I'm showing you, right, at NCSBN, we've released some sample items to the public, like in the newsletter, June 2020 newsletter, you're getting this full set, right?

The point is, rather than start from a blank page with my action model training, you can take these items and modify them for a new scenario. And you don't have to start from scratch, You can say I like this item type, now let me change it to fit what I've got. Okay.

Let's go to prioritize hypotheses. So same client, highest risk for developing what? And then it says as evidenced by the client's something else. So let's break it down like an item writer, let's think logically. When it says the client is at highest risk for developing something, well, we need a key in the pull-down menu, and we need distractors.

So let's go in order. What do you think the client is at highest risk for developing? And spoiler alert most groups have a few answers. I would say there's a little bit of disagreement here so don't worry, don't be scared to type in your idea. We do get disagreement here, which makes me want to talk to my team and see what they thought it was.

But at any rate, okay, sepsis, pneumonia. Yeah, sepsis and pneumonia. Okay, great. So now, what are some things that the client is not at highest risk for developing? Maybe they're at no risk, or they're at very low risk based on this information. Let's get some distractors.

Okay. Deborah, I apologize. Respiratory failure I don't know if that was a key or distractor but I like it as a choice either way. I'm seeing ARDS from Dr. Gina. Anything else as a distractor? What is the client not at risk for or at least at a much lower risk of?

Let's see if we're going to get two more. Okay, love it. Here we go, diabetes. Okay, low risk of UTI. Hypertensive emergency. Love it.

Excellent job. Let's see what the item writer did before we go to the second thing. The item writer went with hypoxia, stroke, dysrhythmias, and pulmonary embolism. Okay, as evidenced by...now, again, this is thinking like an item writer. Be careful here. Well, obviously, we are looking for evidence, right? We think they're at highest risk for a pulmonary embolism because of x, right?

Or maybe it's not pulmonary embolism. But whatever it is, right, we're looking for evidence. However, pretend the answer here were pulmonary embolism. As a non-nurse, I don't know what it is, but pretend it's pulmonary embolism. If all of the findings we list really point hard to pulmonary embolism and don't point at all to anything else, you have now given a big hint, right?

When candidates or students open that second menu, and let's say every single thing has to do with, like, blood clots or something, right? They're going to say, oh, maybe I better change my answer, I thought it was dysrhythmias. But now that I'm looking at the second menu, I bet they want me to say pulmonary embolism. So the point is, as you list your evidence, obviously, you need something to be the right answer, but you don't want everything to point to one place, right?

You don't want to give hints or we call that cueing in the testing world. So let's do it. Whatever condition you thought they were at highest risk for, what's some evidence for that? What's some evidence from the case that made you believe they were at that highest risk? Okay, fever.

Okay. All right, what else? Anything besides fever here, as I'm watching the chat. Okay, the respiratory rate. Excellent. And then the way we would fill out the rest of the menu then is with evidence that perhaps points to something else, right maybe one of the other things on the list.

Okay, I'm seeing a lot of things come in, I think you get the idea. The item writer...and I'm happy to show this because I like what they've done here, the item writer has collapsed a whole bunch of the findings into these larger umbrella headings, vitals, neurologic, respiratory, cardiovascular. That's kind of a clever way to write the item.

I would almost put that menu in my back pocket, right, and use that a lot, right? It's not about I don't have to pick out one little thing. But also sometimes when you think about it, there might have been many things related to respiration that support your highest risk, right? And so if you just list one of them, maybe that's not enough. Maybe it's important for students or our test takers to recognize, well, it wasn't just this one thing about respiratory, it was kind of all of them taken together.

Okay, well done. We get to the fourth interactive item in the set. The nurse has reviewed the nurses' notes entries from 10 a.m. and noon we'll say and is planning care for the client. For each potential intervention, click to specify whether it's indicated or contraindicated for the care of the client.

Perfect. Okay, so this is a little bit like the one we saw before, but I want to call your attention to the fact that new information has shown up on this tab and it's at noon. Noon, so two hours later called to

bedside by the daughter who states her mother isn't acting right. Upon assessment client difficult to arouse, pale, diaphoretic in appearance.

The vitals are a little different here, 101.5, pulse maybe a lot different 112, respiration 32, blood pressure has dropped a bit there, 90 over 62. Pulse ox down 91% on the same two liters. So, things have changed, right?

We've got a before and after. We haven't really done our interventions yet. But it's time to think about what kind of interventions might help in this case. So let's write the item this way. Tell me some interventions that you think could help this person based on the new information we see at noon, but certainly factoring in what it looked like at 10.00? Okay, a sit-up position.

Perfect, Christina. IV fluids. Okay, perfect, Valerie. Okay, fluids again. Good. Dr. Gina, increase oxygen.

Love it. I think we're going to see that. Okay, antibiotics. I'm seeing increasing the head of the bed. Fabulous. Okay, this group is setting a record for the most suggestions. And as a non-nurse, I can't say all wonderful, but I suspect all nearly all wonderful.

Great. Now, thinking like an item writer, let's have some distractors. So tell me some things that would be contraindicated for this particular client. We don't want to be too obvious, like I'm sure nobody would choose, discharge the patient immediately, right.

That's probably a silly one we wouldn't include it. But what are some things that maybe some of your students who didn't pay attention during parts of the year might go with, right, but really, they're contraindicated? What are some things we wouldn't do? Pain meds, yeah. Prepare for chest tubes. Okay.

Increase activity, okay, sit them up in a chair, ambulate, love it. Let's take a look. Survey says, okay, prepare for defibrillation, place client in a semi-Fowler's. I think I saw that from a few of you. Request an order to increase oxygen. The IV, yeah. Okay, and inserting peripheral VAD, right.

So these are the choices, some are keys, some are distractors, right, but you get the idea. It's about thinking about what kinds of things would help, what kinds of things would not be appropriate. Let's go to this next one. Take action. The nurse has received orders from the physician. Click to highlight the three orders that the nurse should perform right away.

So you get the idea the physician has listed five things, right? Well, we can't do them all at once, right? I don't even know if we can do three things at once. Is that possible? Well, nurses are capable of miracles, I suppose. So the way we're going to write this item is I need you to anticipate three orders that would have some urgency. What are three things that could come from the physician that we would want to do right away, ASAP?

Okay, go ahead and use the chat. And I see questions coming in for me. I'll do my best at the end to jump in and try to grab those. Anything I don't get live today I'll do my best to answer by email if I can. Okay. More oxygen, chest X-ray, order labs. You're right.

Oxygen, blood cultures, antibiotics, start the IV, sepsis workup, fluids. This group is awesome. Okay. Now, shifting gears, what are some orders we can anticipate that don't need to be done right away?

Maybe it's you know, you could wait till tomorrow on this one, or, you know, come back later for this one. You could even list something that the nurse might be right to question, right?

But the point is, we've got five things on the list, we can tell so we need to that aren't the right answer. Okay, I'm seeing echocardiogram, physical therapy, MRI, you get the idea. Okay, I think OT, occupational therapy, maybe? Okay, now, item writing trick, right, from Jason here.

Pretend that you were trying to do this and you said, gosh, here are four things that need to be done right away and here are three things that don't. Well, that's okay. That's a good item too. You could list four things that need to be done right away and three things that don't. We would just change the intro and say click to highlight the four orders, right?

So there's flexibility. Sometimes you'll see these numbers and you'll say, okay, let me try and match that. But sometimes you'll say, I've got a better idea they didn't think of and I want to use it. Well, that's okay, go ahead and change it, right. So nothing sacred here. These templates are like guides. Okay, what did the item writer do?

Well, indwelling urinary catheter, some antibiotics, CT scan, some normal saline through IV and lab tests, right, those were the five and evidently, three of these have some urgency to them. Let's finish it off here. Okay, so we see those same orders now listed.

they got a tab so the person doesn't have to remember what they were, right? They are there. And we can see now on the right-hand side, the item. The nurse has performed the interventions as ordered by the physician for the client. For each assessment finding, click to specify if the finding indicates that the client's condition has improved, has not changed, or has declined.

So in these case studies, there's a notion of before and after, right? When you first made your visit, the client after some interventions, and obviously, you know, things have changed, maybe they got better, we hope, some might have got worse, some might have stayed the same.

Okay, so I'm going to actually click now to the original nurses' notes, so we can see what some of the original things were. The way we would write this item when we're talking about evaluate outcomes is, we want to think about data after the interventions were performed. Now, if you look carefully, the nurses' notes here, even though there's 10:00 and noon, these were before the interventions, right?

So in other words, when I'm writing this item an assessment finding now might be temperature of 103, right? The point is, I don't need to just copy and paste the stuff from 10:00 and 12:00. Pretend it's 2:00 or 3:00 now, what does the client look like now? Well, it's not on the left-hand side. We're just going to be describing it over here in this table.

So let's see what you can do. Come up with something that the client might have at 2:00, 3:00, you name it, that would be interesting to evaluate as to whether it's better or worse, or the same. Okay, pulse ox 95%, pulse 88. Okay, these are two fantastic ones.

JVD and crackles. Okay, I hope JVD doesn't stand for Jason Very Dull, but other than that, I like it. Blood pressure 120 over 85, respiration is 12, okay, increased temperature. Okay, fantastic. And it could be stated that way, or temperature could just be listed that happens to be higher than what there was before, right?

Decreased work in breathing. Decreased temperature, sure. Okay. And maybe it depends how much it decreased, right, whether that's good or bad. But the shortness of breath...and we probably want to describe it in a way that somebody could decide whether, in fact, it's, you know, better or worse or the same. But excellent.

This group is awesome. Survey says respiration of 36. I believe that is worse. Blood pressure 118 over 68. I believe that is better. Don't trust me, y'all. Pale skin tone, I feel like that's kind of the same-ish, but I may be missing some subtlety.

Pulse ox 91. Well, that seems the same as noon so I guess that's stable. And then interacting with daughter at bedside. Now I'm going to be honest, I like your work better than this item writer for one reason. As a testing professional, it's very important to me that items are very precise so there's no ambiguity.

As nurses, you may see interacting with daughter at bedside, and you may know that that implies positive healthy interactions. For me as a testing professional, the word interacting can go either way, right? The interacting could be argumentative, paranoid, right? So I would prefer something more specific. To me, the word interacting has some ambiguity.

So I like your choices better but you get the idea. Well, congratulations, you have made it to the end of a case study. Why do I do that exercise? Because I want to demystify these NGN items. I want to demystify our Clinical Judgment Measurement Model, these boxes, right? So again, I have a full half-day training or a half full-day training, take your pick, called the Action Model, that's all about writing from a blank piece of paper, right.

But one of the great ways to come up with ideas is to look at ones we already have, and put some twists, right, or come up with your own, okay. And you could imagine, you know, how could you really make some changes? Well, you could change some things in this scenario, right, and then ask the same questions or ask different questions.

Okay. Well, I mentioned at the very beginning, we have two different ways to measure clinical judgment. One is through the case study, but, well, you saw, case studies are long, right? It's a lot to read, and then you have to answer six questions. We also have items, individual items, one item called standalone that measure clinical judgment all by themselves.

And interestingly enough, they may target more than one of those boxes they usually do. I will illustrate that for you but we have a newsletter that goes into more detail. So let's see, we've got the sample trend item here. The trend is the first of our two.

What is a trend item? I'm going to focus less on the content here because we're pretty contented out if that's a word. What is a trend item? We are presenting information at different points in time, right? I think of it as time-stamped data, in this case intake output and nurses' notes, right? And then we're simply asking a question about it.

And as the name suggests, well, probably there's some trend that we should have noticed or paid attention to. So I mentioned that the standalone items, right, it kind of looks like a case study but there's only one question. These standalone items, nonetheless, can target multiple boxes out of those six-layered three boxes.

Well, let's take a look. This one is asking which of the following procedures should the nurse anticipate? Well, that probably reminds you of the generate solutions or take action type stuff that we just saw, right? However, you can imagine, for someone to be successful with this item, they would have had to implicitly recognized cues, analyzed cues, they may have formulated hypotheses, or picked a particular condition that needs prioritization.

So the point is, they may have done the first four steps in the Clinical Judgment Measurement Model to be able to answer what may here feel most like a take action. So that's what I mean by these things may address multiple boxes. Let me go into the bow-tie. This is the second of two ways we can measure clinical judgment with just a single item.

So here we go. I won't delve into the content deeply at all, I'll just note. Again, we see a couple of tabs kind of like an exhibit item today. On the right-hand side, we have something a little unusual you haven't seen yet. We call it a bow-tie item because the place you put your answers is shaped like a bowtie. I know hardly anybody wears those anymore, but I think Urkel and Young Sheldon might be the last holdouts on bowtie.

But at any rate, you can see kind of a little X shape, we call it a bow-tie. Anyways, it's a drag and drop, but there's some special structure, the bow-tie structure. What does it mean? Well, it means in the middle of the bowtie where the knot would be, condition most likely experiencing, well, only the things from the middle list can go there.

Actions to take. Only the things on the left can go there. Parameters to monitor. Only the things on the right can go there. The computer won't let you put Bell's palsy into action to take. The computer guards against these things. So there's some structure, but the computer kind of helps in case anybody gets confused.

I think you get the idea. I mentioned checking off more than one box at layer three. Well action to take, that sure sounds like take action. Condition most likely experiencing, that probably sounds like prioritize hypotheses. Parameter to monitor.

That has a little bit of an evaluation field. And again, to be successful, the candidate would have had to recognize cues and think about what they mean. In other words, analyze cues, right? In considering actions to take, they might have thought about more things before narrowing it down, right? So maybe some generate solutions. Some of my colleagues will say that our bow-tie items check off all six boxes.

Sometimes I look at them and I decide five. But the point is multiple, right? There you go. Well, we have looked at almost all the content we're going to look at, and we're going to shift gears. We're going to go into test design. Test design is essentially the architecture of the next generation NCLEX.

How many questions? How many hours? How many case studies? Bow-tie, trend? Is there some number of those we should expect? Some of you know we use Computer Adaptive Testing, we call it CAT. Is that still in the mix?

Etc. And these are the questions I've been asked for years. And luckily, it was really in the last 12 months, that we finally analyzed enough data to be able to decide on the answers to all these questions. So good news for you, is I'm going to answer pretty much everything here. However, the big question is one you don't see here. This is really the big question everybody wanted to know.

And I bet even for all of you, you want to know. Here it is. Okay, come on. How different is the NGN from the NCLEX? You've certainly seen some things that are different. The question is, is that the whole exam? The whole exam is case studies, bow-tie, standalone, oh my God, this is going to be a crazy test right?

Or is it mostly the old exam, but with a few things we added a little bit? Well, let's see. So I will encourage you to picture today's NCLEX as a cheese pizza. So we know it's not really a cheese pizza. If it were, your students would like it better, and they would finish faster.

Okay, but the point is, it's a cheese pizza. Now, next-generation NCLEX, is it a hamburger? Is it spaghetti? Is it a Caesar salad? Or is it this? Here it is. Next-generation NCLEX is that cheese pizza with some toppings.

Here's what I want you to know, the overwhelming majority of questions your graduates will see are exactly like what they would see on the NCLEX today, okay. The vast majority of the test is staying the same, right? Just like this pizza on the right, you can call it a pepperoni pizza, I'm going to call it a cheese pizza but with a few pepperoni on it, right?

That's the NGN. So let's now quantify some of this. Okay, we call this the approved test design. The most recent NGN newsletter is all about the test design. It is our most dense but informative newsletter. It goes into great detail, which I am just summarizing here.

So time, staying the same. Let me emphasize by the way, some of you have RN students, some of you have PN students. Everything you're seeing right now applies to RN, and PN, no difference. I'm not going to show you a second chart, okay. So the time stays the same.

Delivery, we're still using Computer Adaptive Testing. We say variable length because you probably know some of your graduates get a really short exam. They say, "Oh, gosh, this is scary I finished after 75 questions. Does that mean I failed?" Well, you know, actually, it doesn't. But okay. And some of them are like, "Oh, God, I hated the exam, I got 145 questions. I must have done really horrible."

Well, no, not necessarily. It doesn't mean that, right? But it does have to do with how long it took the computer to figure out whether you passed or failed. But point is variable length cap, different test takers can get different numbers of items but of course, there's a range, 75 to 145 today, how about the NGN? A little more, right?

We care mostly about the top end because that's where you start to worry about running out of time. On the top end, it goes up literally like, you know, two-ish percent 145 to 150. So not a big change there. You may know, today on the NCLEX, some of the items do not count. Some of the items do not contribute toward the pass-fail result.

And we call these Pre-test items. We use them simply to collect data so we can decide if an item we just came up with, right, and put through our review committees, will be good to use in the future, right? We need data to make these decisions. Everything we do on the exam is based on data.

Yes, I know that well. Okay. So what that means is takeaway these 15 that don't count, and we get the number of scored items, the number of items that count. Well, the candidates can't tell the difference. But the point is 15 don't count, here comes my math degree being put to work. I will now subtract 15 from the total items.

And we see today's NCLEX 60 to 130 of the items count, NGN 70 to 135. So again, a little more, but not much. Now, let's break down those numbers. Case studies, how many will there be? Three that count. Three that count.

I am giving it to you true for all candidates, all candidates will get three case studies that count, take it to Vegas. Okay. And each case study had six items, again, showing off the math. So that means 18 items are coming from case studies. Here comes some subtraction then, all right, on the NGN what's left? Well, if we take away the 18 that are in case studies we're left with somewhere between 52 and 117.

I wish the numbers were a little more round or something but you get the idea. It is what it is, take away three case studies. Now a difference between today's NCLEX and the NGN is the composition of those items. Today's NCLEX you know what they are multiple-choice, select all that apply, exhibit item, the usual suspects.

NGN, well, you saw bow-tie, you saw trend, but I also told you a whole bunch of these. Most of these are just normal NCLEX items that you know and maybe love today, but certainly know. Ballpark, I think what you'll read in the NGN newsletter is that roughly 10% of this number are kind of like that bow-tie trend, you know, NGN special type stuff, whereas about 90-ish percent of the number is going to be more like today's NCLEX.

So there you go. We mentioned the 15 that don't count. But I want to say a special word about those. Today the 15 items that don't count look just like the rest of the test. Makes sense. Well, for NGN, there's a twist, right? For NGN, they're going to look just like the rest of NGN.

What does that mean? It means in the 15 items that don't count, there could be a trend item, there could be a couple of bow-tie items, maybe, right? There could even be a case study. And if you really think about it, there could even be two case studies and 15 items, right because it's six items per. Wow.

Okay. So, you may have a graduate come back and say, hey, you told me three case studies, I got four, right? We know students, graduates love to, you know, point these things out. And so their test wasn't broken, right. The point is if somebody did come back and say, I got four case studies, you know three of them counted one of them didn't.

Could they tell them apart? Well, I hope not. But probably not, right. Okay. Anyways, that is the test design. Okay, we are closing in on the final pieces here of the presentation before we get to resources and Q&A. I'm seeing so many questions come in that I'm going to maybe go a little faster than normal for scoring, to try to conserve some time.

Let's see if I could do that. So NCLEX today, any question? It's either right or wrong, period, that's it. No partial credit, right. But it was a select all that apply, and four of them were the right answer. And I got three of them how could I get a zero, right? We know, right?

We know. Well, that's all changing, believe it or not, right? When we get to the NGN, right, any of these sort of complicated item types, even today's ordinary select all that apply, are moving to partial credit scoring. It's a more complicated model, but it provides better information. I'm going to show you that. So what does that mean? You will have, like some of the items I showed you in the case study or some that you helped write, maybe the item is worth 4 points, and somebody could get a 4, but they could even get a 3, or a 2, or a 1.

And of course, they could still get a zero. Again, I hate to be complicated, but we have three different ways that we assign partial credit on the NGN. You don't need to be a scoring expert, I promise. We're not going to send the exam to you to score for us. You don't need to be a scoring expert. I want to acquaint you with how we're scoring. But believe me, I'd much rather you have an appreciation for the clinical judgment and how we test it than how we score it.

Nonetheless, here we go. I choose geography examples here just so we don't have to think very hard at all about what the right answers are. Sometimes in nursing, you might look at something and say, oh, that could be corrective. Well, I don't want to go there. Okay, so partial credit, we can assign it three different ways. The first method is called +/- . And as the name suggests, you can get points for doing things right, you can lose points for doing things wrong.

Let's take a look, pretend a candidate what countries are in North America goes with this? France, Mexico, Canada. Well, obviously, France is wrong, Mexico and Canada are right. Well, +/- scoring let's give a point for the right answers let's take away a point for the wrong answer. And we would get a final score then of 2 minus 1, 1 point total. Well, the best possible student out there hopefully, a lot of them, by the way, could have just put Mexico, Canada, United States, they would have got 3 minus 0, they would have got 3 out of 3.

So a maximum of three points are possible. The response indicated, despite having two right answers, gets one point. Why? Because there's a penalty. Why do we build in that penalty? Here's the answer. If there were no penalty, why wouldn't you just click every box, right?

If there were no penalty, and you came to a select all that apply, just check all the boxes, you've covered all the keys, and there's no penalty for the stuff that's wrong, right, you've just ruined our test, you've ruined our item type. So the point is, we have to build in penalty to prevent someone from sort of gaming the system and just checking off all the boxes.

So that's why. A quick little footnote here which will be on the quiz is that theoretically, you could imagine an overall negative score. For example, pretend the candidate only checked off France. Well, if they only checked off France, they didn't do anything right and they got one wrong. So that would be 0 minus 1 equals -1.

However...pardon me I'm losing my voice a little bit. However, we are kind here. We always round up to zero. We do not assign negatives. So somebody, the formula gives them a negative, we will give them a zero. Okay, that will be on the quiz I think. All right, let's now look at an item that's almost identical but we score it a different way.

Here we go. And you saw one of these, I think, in our case, you know. I think we had a which four, or which three or something in one of our samples. But anyways, which three of these countries are in North America? And now here we go, the computer will not let you check every box, the computer will not let you check more than three boxes.

Well, therefore, since you can't do that, we don't need to penalize. Let's pretend we get the same response France, Mexico, Canada, we can simply say, hey, good job on Mexico and Canada. France, no, not yet I wouldn't mind if that vacation were a little cheaper but we're going to call that wrong.

But it's just two points. There's no penalty. So what was the difference, because these two questions look almost the same? Well, the penalty is needed to prevent gaming the system, checking all the boxes. But

if the computer doesn't let you check off all the boxes, then I don't need to build in the penalty. So we call this 0/1 scoring because for each of the responses, you either get a zero or a one, whereas in the previous example, you either got one point or -1 points.

Third and final approach is the one used the least, but I'll share it nonetheless. It is called Rationale Scoring. And the way rationale scoring works is if you look at this question, it's kind of connecting countries to their capitals.

You see four places where a response, drag, and drop response needs to go. You see four things, we don't have to score it as four points because maybe we care less about a country or a city, we care more about a relationship. Example, capital of France is Paris, rather than say, great job, two points, we're going to say you know what the whole point of this item is the relationship and you got this relationship right, therefore, you got a point.

In rationale scoring, we are combining multiple response elements into a single scorable unit. I know that's some testing jargon for you. Let me illustrate with this next example. Capital of Egypt is well, of course, it's not Japan, but you can imagine if we scored each box by itself, I wouldn't really know what to do with an answer of Egypt.

It's not really wrong by itself, right, but I don't really know what to think, right? But obviously, the statement, the capital of Egypt is Japan is clearly incorrect. So it's just a decision that we made to say, hey, we're going to group some of these units together for scoring purposes. So in this case, we would choose to give one point for the first sentence, no points for the second sentence.

What does this look like in nursing or on the NGN? You might see something like...I think we saw an example of this. I think we saw a pull-down menu just this way. The client is at highest risk of x, because of y, right? So what do we care about here?

Well, we care what they're at the highest risk of. But the point of this question is the relationship, the rationale, connecting evidence to outcome, right? Other example the nurse should question the order for x because of y. We care about the reasoning here. Did you choose the right thing for the right reason?

If so, great job, you're scoring a point. If you chose the right thing and gave us the wrong reason, that might start to look more like you just random guessed, or that there's a misconception perhaps significant enough as to almost outweigh what you did well. Point is, sometimes it makes sense if the response options are connected to each other, to go ahead and connect them for scoring purposes.

Benefits of partial credit scoring. Measurement precision, this is really what it's about. I'll illustrate this. Pretend that all of your students ever are lined up from least knowledge and ability to most knowledge and ability. Anytime I ask a question that scored 0/1, all right or all wrong, it divides those students or my test-takers into two groups.

These groups can be very large. And as you know, the group that got it right may include somebody who just barely knew enough, and somebody who knew everything, right? So these two groups have a lot of variance. These two groups are very heterogeneous, right? The candidates in each group might be very different from each other. Well, ultimately, what we're trying to do with the NCLEX next generation or not right, is get as precise a measure as possible of the candidates' ability, right?

And so if we use partial credit scoring, we've now taken the same lineup, and with a single item, with a single item, but partial credit scoring, we've now made five groups. Each one is pretty small. The candidates in each group have more in common with each other, have closer ability estimates to each other.

So you can see throw a lot of items like this on the test, and we much more quickly arrive at a very precise ability estimate. Pardon me, I had to get a little drink there. So, what do I want to say? One of the questions that came early when I would do presentations is people would see all the stuff we were adding to the test and they say, oh, my gosh, this test is going to be really long.

This is going to have a lot of items, right? One of the nice things about the partial credit scoring because it provides more information per item is we don't need as many items to get to the final ability estimate, to get into the pass-fail. We can do it more efficiently with fewer items. That's how the test is staying about the same, even while measuring new things like clinical judgment.

Okay, appropriateness probably speaks for itself. You see a complicated item, it probably makes sense to you that we would look at partial credit. From the perspectives of students, I would say it's probably perceived as more fair. If you have someone who comes to you and says, no fair, I got all of them, but one and they gave me a zero. Well, that student will love the NGN.

We're going to try this together. I am taking some samples from the first case study we looked at. It was the person hit by the baseball having some issues. And we are going to decide how should this be scored. And I know I gave you a crash course. This is going to be probably difficult. But partly me even sharing the answers will reinforce the learning.

Okay, so we just saw very quickly three partial credit, pardon me, scoring methods, all fairly new, novel to you. But let's take a look. Drag the assessment findings that require immediate follow-up to the box on the right. And we can pretend that the candidate did this. First question, let's use the chat, is this going to be a +/-?

If it is go ahead and type plus. Is it a 0/1? If it is, go ahead and type zero. Is it rationale scoring, if it is type rationale, or type R if you like. So what's the scoring method I should use here? Okay, I see a +/- from Aaron. I see +/- from Sharon.

If your name rhymes with Aaron, you're getting it right. Okay. I see Gina as well. I'm seeing a lot of +/- . Yes, this group is amazing. It is +/-, because, right, somebody is able to select every single response, right? Somebody could, it would take a few more seconds, but somebody could drag everything over, right?

So we have to build in the penalty. Well, now I'm going to tell you, out of the five things that were dragged four were right one was wrong. Who can tell me the final score? What score should I assign? Okay, I see a four, I see some threes. I see a few more threes.

And a few more threes. Indeed, the answer is three. So remember, with +/- scoring, we're going to count up the correct which is four. But the whole point of the minus is we're going to take away a point when we see something wrong. So 4 minus 1 gets us to 3. Okay, again, I gave you the crash course really fast.

I am seeing a great question about why aren't they penalized for not pulling over something that was correct? Let's pretend productive cough was correct. Well, they didn't pull that over shouldn't we deduct

a point? Well, guess what we already did, right? If they had pulled it over, they would have earned a point for it. By leaving it there, they did not earn that point, they left that point on the table.

So the point is we don't have to sort of give them a double whammy, we don't have to say hey, it's not there. We're not just not going to give you the point, we're also going to lower your score another notch. If you really sort of study the situation, you'll see that there was no need to do that because they already lost that point.

I saw that question come up earlier while I was I think explaining the +/- . It's an excellent question. I had the same exact question myself when I was introduced to the scoring methods. Let's go to...oh, here we go. Here's the answer. Let's go to the next one. The nurse is speaking with the physician regarding the treatment plan for the client who was just diagnosed.

Well, we saw this, right they had spleen laceration, and some monster from Jurassic Park. It looks like hemothorax souris. Okay, here we go. How do we want to score this one? It's all these potential orders that we need to check off as anticipated or contraindicated. What's our scoring method going to be?

+/-, or 0/1, or rationale? Find a way to tell me in the chat. Okay, I'm seeing some 0/1s early on. I'm seeing some 0/1s early on. I'm seeing some rationale or one rationale so far. 0/1. I'm seeing more 0/1.

I had to think about this one a lot because I can check off every choice for anticipate. I can say everything is anticipated. So I thought, oh, I better build in a penalty. But here's really what it comes down to. The computer is not going to let me check off everything in the anticipated column and everything in the contraindicated.

In other words, there are 16 bubbles looking at you, if I could check off all 16 bubbles, of course, we need some sort of minus, right? Yes. Oh, my gosh, Mary has said it perfectly. They can't check off all 16 bubbles, therefore, no penalty needed. 0/1 is going to work in this case. So let's pretend here's their answer. And one at a time.

I didn't know that. Okay, well, now we're going to evaluate every row is either right or wrong. And it looks like there are three correct and five incorrect. What is their final score? I'm checking the chat. I see three. I see three out of eight.

I see three. I see three. I'm seeing more threes. Guess what this group is amazing. It is in fact three, right? It could be tempting to say should I do 3 minus 5? But again, we already established it is not a +/- scoring, therefore, we just count up the stars.

So it's just plain three. And the person who said three out of eight who's scrolled away past, what I'm looking at, is in fact entirely correct. This item literally could be worth up to...well, it is worth up to eight points. You could get eight out of eight on this if you did everything perfectly.

Okay. This candidate would get three, get the math there. Let's go to the...I believe this is my final example for scoring. Okay, click to highlight the findings below. Okay, we've seen this. Let's pretend that this particular candidate clicks on this, able to ambulate, clicks on this, refuses the spirometer.

I've been there, I can relate, that's no fun. And adequate urine output. Okay, so these three things are clicked on. Well, let's do this. First off, can you tell me the scoring method already, even before I tell

you whether anything is right or wrong? Scoring method here I am seeing from Aaron a plus. So +/- from Aaron.

Anybody else? Rationale I'm seeing from Don. Okay, I'm seeing rationale again. I'm seeing rationale again. Okay, let's wait for one more answer. Somebody else type in. Oh, a question from Aaron, could I highlight the whole thing?

I could highlight as many things as I want. Yes, Aaron, I could do that. I'm seeing 0/1, I'm seeing plus, and I'm seeing more rationale. So this was kind of a challenging one. We've seen all three suggested. So let me mention...I'll give the correct answer and why I believe it's the case. You could click every statement, therefore we do need to build in a penalty.

Therefore, +/-, not 0/1. Now, sometimes...I think if you're writing rationale, you may be looking at things like the client is refusing to use the spirometer because it causes pain, right? So there's a little bit of a rationale from the client's perspective. But from a scoring perspective, are there multiple pieces of the response that we want to group into a single thing?

Here I would say probably not. That could be a judgment call that can be subjective. But here, I think we're in a position to evaluate each click on its own. Example, this first thing, wrong. This second thing, correct. This third thing wrong. So keeping in mind, we're using +/- scoring, who can tell me the final score for this candidate?

I am seeing a couple of zeros, I'm seeing another zero. I'm seeing a lot of zeros. Goose eggs all around. If it were baseball it would be a shutout only, there's no season. I'm seeing a -1, which I'm happy to see. I'm seeing another -1, which I'm very happy to see, because, right, as we call it, a teachable moment.

So we have the +/- scoring and here's that part I said was going to be on the quiz, right? And I know how fast I've given you all this information. Do not worry if you're not a scoring expert yet, or even ever because we do the scoring. But point is, if we just counted up, we get 1 minus 2 and so we do get -1, right? However, remember that last detail of +/- scoring is that we never go negative, right?

The lowest score we can give is a zero. So -1 on some level is kind of technically more correct. However, we would give a zero here. There you go. So I'm glad I saw some each final score zero. Okay, y'all, you asked so many questions, I went a little faster than usual through the scoring.

Please forgive me. We'll see what we can do from here. Resources, let me be quick here, too. We have a website, of course, ncsbn.org. Upper left-hand corner, NCLEX, and other exams. Go down the list you get to and you'll see next-generation NCLEX. And within that, I love to click on NGN resources because it takes me to these newsletters.

I really believe for educators, these newsletters are solid gold, especially case study. If you only read one read case study. But my advice if you can find the time, read them all. These are excellent because just like this presentation, they just pick a topic and tell you what you need to know and show you examples, and do a good job explaining, right?

This new one I mentioned is pretty thick. And so, you know, some of these you can read in five minutes, some of these you might need 20. But okay, what else? For those of you with more of a research and academic bent, we have sort of academic journal-type papers, you've seen these, I'm sure, including at the very beginning, it feels like yesterday, but a couple of hours ago, I mentioned our literature review.

We mentioned that Strategic Practice Analysis. Some of these foundational documents in terms of the research and the rationale for the exam are also available through our website. With that, oh, gosh, I am going to do my best. The chatbox...this is the nature of these presentations. The chatbox, of course, is a mix now of you helping me write items and score items and questions you've asked.

So I'm going to do my best to scroll through. I'm going to also stop my sharing, and I'll be perhaps a little bit bigger on your screen. Let me see what I can do here. Okay, so from Vivian, are reference ranges given for all? And the answer here is yes. So that is something that no longer would need to be memorized. Now warning, the new exam launches in April 2023.

If you have somebody taking the NCLEX this May or June, or July, they still need to know these things, right? So it's a shift coming in April 2023. Reference range is provided. Now that of course applies to things like the case studies to be more realistic. But if you really think about it, it has a ripple effect across the exam, because what would be the point of having somebody memorize all these ranges if when they come to our case study, they can just copy them down on their whiteboard, right?

So the point is, there's impact across even the normal NCLEX, if I can call it that. Diana asks, is drag and drop ADA compliant? Fantastic question. So we had some specialists or experts, I guess I should say, with ADA review the new item types. And what they determined, as I think you've anticipated, is not all of them were appropriate for all populations.

Therefore, just like there are accommodations available on the NCLEX today, the next generation NCLEX will support accommodations that include, in particular, potentially getting an exam that doesn't have a certain item type. So I'm sorry that I haven't memorized which ones are which so I won't guess, specifically with drag and drop, but I know that was definitely one that was looked at closely.

The point is, there would be modifications for particular candidates. NGN, same number of questions as the current exam, how much time? So that came under test design. What you saw is that, potentially, it could have five more questions, potentially, it could have five more, it's always variable. So different people can get different numbers. But at the maximum end, the NGN would have five more questions than the current exam.

The time would remain the same five hours, that's our NNPN. Teresa asks, will the terminology be changed to prescription order? I get this a lot. I'm always scared I'm going to confuse it as a non-nurse. Let me tell you because I get it so much and I answer it so much. So I don't have notes in front of me, but I believe when we say prescription, we will very specifically be thinking of medications.

When we say order, it's kind of a broader class, right? It might include like, getting an x-ray or a CT scan, but it could include medications. In other words, order is kind of just this bigger category of which prescription would sort of point to a smaller subset. I think I have that right.

Okay. How many case studies? And you saw that answered with the test design slide. Three case studies that count, however, a lucky or unlucky candidate you decide, not me could see one that doesn't count, they could even see two that don't count, although that would be a lower probability. Okay, from Linda, would the student be able to backtrack to the previous questions?

I'm so glad somebody asked that. Linda, thank you. So the way a CAT exam works, is it's a one-way street, you can never go backwards. That's the bad news. So you can't skip a question, you can't, you

know, do something else and go back and hope to change an answer or something like that. It's a one-way street, you can only go forward. Here's the good news.

In the case study, all the information on that left-hand side stays there, it doesn't go away. You don't have to say, oh, I wish I remembered what it said in that first one, right? It just stays there and if anything, it gets bigger, right, an extra tab might get added. But we don't take any of that information away. Therefore, you don't have to go back to the previous question to read it, it stays with you. Let's see, can some share...so this was a question for each other in terms of LMS.

So I'm going to leave that with y'all. At NCSBN, we do our best not to endorse or recommend or anything like that. But certainly, when people are thinking resources, I would certainly say wherever resources are coming from today, talk to those folks and ask them what they have going on with NGN. If you don't like the answer, well, you could talk to somebody else, you know.

But the point is, at NCSBN, we don't point to a particular provider or anything like that, whether it's LMS, or test prep, or anything. So I apologize for that. Kathy says is the percent of standalone items after the minimum number still 10%? I'm going to say there, and I apologize, I mentioned our latest newsletter is quite thick. I've read it twice but I'm still...you know, I'm not confident enough to answer your question other than to say that newsletter definitely answers your question.

I will confess I don't quite remember if it's 10% after the minimum number, or if it's 10% of the whole thing. I do know because there's some randomness that 10% shouldn't be taken as exact either way. There's always some variability with that percentage. Okay.

Will all select all that apply from Vivian. Will all of them go up to eight choices? No. By the way, you did see a lot of eight response option questions here, nothing magic about eight. If you saw 8, it could have been 7, it could have been 9, it could have been 10. Picture one of these on today's NCLEX that has five response options. If we're still using it in a year, good chance we are, it'll still have five.

We're not going to add extra choices to items we already have. However, what will change is we will apply the partial credit scoring to the items we already have. Okay, oh, things are starting to scroll up on me as people are typing in new things. Let me see what I can find.

Okay, Lorraine asks for Satta. Can one or all options be correct? Answer there, yes. I think they're most interesting when they have more than one correct. But technically, if somebody wrote one with only one correct, we would not use that as a basis to reject the item.

It would be eligible. Okay. Whitney asks. Yeah, they don't get a point off for not selecting the U.S. So good. Yeah, I'm so glad that that question got asked. The whole idea, if you really analyze the problem is they already lost that point.

If you really think about it, they didn't get that point. You remember, in the example, I showed, the person got one point they got...it was like 2 minus 1 equals 1 but it was one point out of three. If they had dragged U.S. they would have gotten two. Therefore you can almost think about it like, the negative did happen.

Okay, let's see what else. Whitney, they don't get a point...same okay. I'm sorry, I just read that. Okay. Terry, will there be questions where the student must get all the answers correct to get the points? Okay, I have to think a little bit.

It's a little bit outside the box for me. I'm going to say in general, no. When we say partial credit, we mean partial credit. Now, there's some exceptions, for example, think of just an ordinary multiple-choice question. Well, for a multiple-choice, you know what, there is no partial credit. So a multiple choice is sort of a non-interesting example of where there's no partial credit. But in general, anything that looks like it's probably worth partial credit, it really is.

There aren't interesting exceptions, I guess I'll say. Okay. Liz is asking, this question is three possible correct answers, but only two options, would there ever be this possibility, NGN?

Liz, you may not remember anymore. But if you know which item you're referring to give me a hint and then I'll do my best. At the moment I'm not totally sure that I understand, so I apologize. But if you can remember the item that may help me. Okay, let's see what else I have. Okay, Mary says, I thought for now, only on the NGN questions were reference ranges and not current questions.

Right yeah, Mary, it's a really good point. Today on the exam, we don't provide any reference ranges. But what we anticipate for the future is that if we're providing all these reference ranges in the case studies, then it's kind of pointless to ask for memorization in the ordinary items, because we don't want candidates wasting their time copying down every single reference range in a case study thinking they got a freebie, right?

The whole point is, we're going real-world here even with a ripple effect on to the ordinary items. Okay, let's see where. Okay, so many are coming in, I'm doing my best to not lose anything. Okay, how can I obtain the NGN resources? Well, the short answer is the ones that I highlighted, obviously, on our website is where we keep all of that.

In terms of things like people have asked me are there, you know...what curriculum from the big publishers already has all this stuff? Again, that's where at NCSBN we don't point anybody to anything other than, I do say follow up with where materials come from today to find out what that roadmap is. I do know from publishers who've talked to me some things are already out, and some other things have the "coming soon label" I suppose.

Okay. Let's see. They're still coming fast. I'm doing my best y'all. Answers can be changed on one part of the question when working on the same question, correct? Yes, absolutely. Until you submit the entire item you can change whatever you want.

Absolutely. Okay. Question above was skipped. Okay. Oh, sorry about that, Aaron. So the RN was always interacting with an MD, in the NGN, will they sometimes be working with an APRN? Oh, my God, excellent question.

This is something that I learned and nobody had asked me about before. But yes, I think today on the exam, we use a phrase like primary healthcare provider a lot, something like that. On the NGN again, authenticity, you may see words like nurse practitioner, physician, surgeon, etc. Sort of different members of the healthcare team, or different titles, or licenses, etc.

You get the idea. So the short answer for you is yes. I don't know that we would say APRN. I think we might say, nurse practitioner but the general idea is yes. Is that drop-down Cloze? Yes. So whenever you see a drop-down menu item, it is a cloze item also.

I would just call it a pull-down menu or a drop-down menu item. But technically, it's sort of in a class of items called cloze items if you talk to measurement experts. Okay, Vivian with a thank you, which I really appreciate. And then in terms of a case study, there's all the information on the left, do they have to toggle back and forth?

Yeah, right. So pretend that the case study, one of the ones we saw had this, has four tabs. All four tabs are available all the time, right? You might be on item five, and a new tab showed up and it's... I'll call it the active tab or the tab that's opened by default.

But yeah, you can click on any of the other tabs and they show up too. So you don't lose anything on the tabs. If you're looking at lab results, and now you want nurses' notes, well now you gotta click that nurses' notes tab, right. It won't read your mind, but the information is all there. The example with countries as their capitals.

Okay, thank you so much for that. That one...I'm glad it was geography because then I really remember the question. So question was, yeah, there were three possible but only two options. You make a good point. I would say that would be atypical for NGN. I think for NGN, we would probably go ahead and sort of max out, right?

Yeah, there could have been three correct statements with countries and capitals. And I just asked for two to keep my scoring teaching short. So yeah, that's a great observation. Okay, I take it there will be delegation prioritizing questions. Are there more mid-surge questions or does it vary by student?

Oh, gosh, I'm going to ask a favor of Jasmine. I always get a little scared on these that, you know, I know some of the terms in terms of delegation have very precise meaning that an ordinary non-nurse like me, could slightly get wrong. If possible, if Jasmine could email me this question, I would like to get a response from my team members, and then find a way to route it back to all of you who attended.

But I'm a little scared to answer it now because I'm worried I could get it wrong. I don't want to give you the wrong information. Okay, good to know, in terms of the reference ranges. It looks like generic med names, still the only med name? Yes.

And in terms of authenticity, that may be a break, right? In some places, maybe the trade names are what comes up more often. But here, we made a decision to go generic, I think, for a few reasons with the NCLEX many years ago, and we are sticking with it even for NGN. Okay, did not see the newsletters from Kay Anderson. So, yeah, ncsbn.org, you probably see the NCLEX and other exams in the upper left-hand corner.

If you click that, you'll then see a long list of different tests and things like that on the left-hand side. And then once you find NGN project, there's a choice for NGN resources. I know it's a lot of clicks. But the point is, when you click NGN Resources, the newsletters are literally like the very top of the page.

But here's what I do. If you were to do a Google search, and you just put NGN newsletter, it literally...your first result would be the page with all the newsletters. So that's awesome. That's how I get there the fastest. We are number one in the search results. Okay. Where will I find the link to the presentation?

I think...okay Anita has already answered that. Wonderful. Thank you, Anita. Oh, and a direct link from Kathy to the newsletters. Thank you. Scoring for the cloze items like the pull-down menu items. Honestly, it depends a little bit.

Our scoring newsletter gives several examples. So I would encourage that if the menus are connected by a because then it's almost always rationale scoring, right, because the pieces go together. If it's more like, the nurse should be interested in this thing about the client, and also this thing about the client, well, those might be scored separately. And in that case, those would be scored as 0/1 for each menu, right?

You would just get a score for the first menu right or wrong, and a score for the second menu, right or wrong. So with close items or pull-down menu items, there can be some variety in the scoring. The newsletter goes into a little more detail. All right.

Oh, thank you. Thank you, Veronica. From Angelica. Do the scenario questions ever include patient race, or religion, from a cultural competence perspective? And I would say in that case, if relevant to the questions that follow. So the one I showed, or even the two I showed, I believe none of that information was included.

Fairly typical of traditional NCLEX items to include almost as little information as possible, I suppose, about who the client is. But yeah, if important to the questions or the keys, then certainly included. Mary hyping our mailing list, I appreciate it.

Yes, if you're on our mailing list, you will get those newsletters the minute they come out. Linda with a thank you. I appreciate it. Valerie also. Andretta also. Ann also, Deborah, also. Gina also.

Carol says terrible presentation. No, I'm teasing. I made that up. Erin, thank you. Well, let's do this. We still have two minutes to spare and I still have a little bit of a voice. I don't want to leave out our organizers.

Let me just say it was such a pleasure. I wish you all the best success. I am available to come back and do this again, anytime even my half-day Action Model Workshop. Oh boy. So thank you. Such great questions. And I suppose let me turn it back over maybe to Jasmine if that's the right place to take it.

- Or I can take it unless Jasmine, did you have anything to say?

- [Jasmine] No. Win, you can close this out for the day.

- Okay, Jason, Jason, that was just so informative. And you are such a great presenter, very engaging. You have a fabulous voice, by the way, it helped me continue to pay attention, for sure. And I hope everybody who joined us today was able to gain important knowledge. So the National Council of State Boards of Nursing will be archiving this presentation on their website.

And once we package it and get it over to NCSBN, and they get it on their website, we will also be sharing that link via our communications and via our website. So, if you missed anything, you will be able to access it.

And we also encourage you to pass on the webinar to your colleagues. Also, we encourage you to follow the Campaign for Action on Twitter. Join us on Facebook and sign up for the bi-weekly campaign update, which is [www.campaignforaction.org](http://www.campaignforaction.org). That's how you can find out about other programs we have.

So with that, I thank Jasmine for organizing this. Dr. Brunel Dinwiddie for helping us organize this, and several other folks who met with us with NCSBN a month or so ago.

And I can't remember everybody who was there, but Dr. Tracy Merry, Dr. Adriana Perez, and several other people. So thank you, everybody.