

Sponsored by

TITANIUM SPONSORS



PLATINIUM SPONSORS



GOLD SPONSORS



PRESENTED BY



The Outdoor Sports

Friday, August 11, 2006

Textile Outlook:

7:30 to 9 a.m.

Downtown Marriott, Salon E
Salt Lake City, UT

Outdoor Retailer Summer Market 2006

Industry Experts Talk About What's Next!

E V E N T T R A N S C R I P T

INTRODUCTION

Good morning, I'm Kathy Swantko, president of FabricLink. I want to welcome you to FabricLink's seventh Industry Panel held here at the Outdoor Retailer Show. These Panels, comprised of industry leaders, discuss how to be successful in this dynamic market. Today's Panel is going to look at the current and future trends in performance wear, and will also discuss some of the changes taking place in the market, and the opportunities being created.

You can download pdf transcripts of our previous Panels from the FabricLink.com and TheTechnicalCenter.com web sites.

Our last Panel held in at OR's Winter Market this past January discussed "*The Point of Purchase Experience*", including the ways technical apparel is marketed to consumers.

As a result of that Panel, Unifi sponsored a consumer research study that analyzes the reasons why consumers buy performance apparel. The results of the study are included in the current issue of Textile Intelligence magazine.

This is an example of the value these Panels provide, and the ideas and actions that can result. So, before you leave today, please fill out the blue Opinion Sheet. These Panels are for you, and your comments and ideas are important to us.

SPONSORS

Today's Panel is sponsored by 14 industry businesses. I want to thank our sponsors for their support of these events, which provide a unique opportunity for the supply chain to gather and talk about common issues.

The Panels also help to foster a sense of community within our industry.

A special thanks to many of our sponsors for providing promotional gifts for your goodie bags. Also, there are several lucky attendees who have received a "Golden Ticket" like this in your bag. Milliken/Visa Endurance and Under Armour have provided some very special garments for the random prize give-away. If you find a "Golden Ticket" in your bag, please see Ann Stables of Stables Inc. at the end of the Panel this morning to claim your prize. Stables Inc. has played a major role in helping to organize this event.

Today's Panel is Titled a "*Textile Outlook*"

The Panel will talk about current and future trends, innovations and changes impacting the outdoor wear market.

Some of the topics to be discussed include:

Sponsored by

TITANIUM SPONSORS



PLATINIUM SPONSORS



GOLD SPONSORS



- What trends are hot now, and what's coming next.
- How cross-over fabrics and technologies from the industrial, military, and medical markets are impacting the performance market.
- The price-quality battle, and the impact it's having on a brand trying to protect its position, and?
- Where are the opportunities for suppliers and for the brands.

INTRODUCTION OF OUR PANEL OF EXPERTS:

Let me begin by introducing our Panel of experts. You'll also find brief bios of each on the front of your Agenda Brochure. To my far right (your left) . . .

- Representing Colors/Trends is **DINA PUGLISI**, Color Management Consultant for Archroma Global Services/Cariant.
- Representing fibers and yarns is **JIM MORELLI**, vice-president for American Fibers & Yarns Company
- Representing Leather product Development is **MIKE DODD**, Marketing Director for Pittards.
- Representing Knitted Product Development is **STEVE LUCIER**, President of Deer Creek Fabrics.
- Representing Specifications is **JOE WALKUSKI**, President of TEXbase. (I should mention that prior to starting TEXbase, Joe previously served as the director of textile research & development at Patagonia for 13 years.)
- Representing Branded manufacturing Product Development is **RICHARD ZIELINSKI**, Vice President of Technical Services for Under armour.

I want you to know that we will have time for questions and comments. But, I ask that you held any questions or comments until the last part of our program.

KATHY SWANTKO – Okay, let's begin, and move right into trends.

What are the hot trends and the new product developments in the outdoor wear market right now, and what do you see as becoming important? Let's not only talk about finished products, but also look at the raw materials, constructions and designs that are making an impact.

JIM MORELLI – Good morning. What we get as a yarn producer---our customer base is primarily not only converters, knitters, or weavers, but also retail level---the requests we get is for comfort, convenience, and consumer care. So, from our standpoint is the all-in-one fiber. As a result, we try to engineer as many properties as possible into the fiber---animicrobial, UV resistance, repellency, bleachability, etc. We try to engineer into the fiber every possible property that will translate into a consumer benefit. And, that's our role, as well as to help come up with different yarns to meet different processes, whether is some kind of specific knit process that we're trying to get to, or some kind of woven process. And for us, that customer base ranks pretty much around the world, whether it's in Asia, U.S., South America, or Europe.

KATHY SWANTKO – *Mike, do you have any input on that from the leather side?*

MIKE DODD – Yes, I would agree with Jim that there a lot of work to be done on things like antimicrobial---the health and well being of the product that you're wearing in the outdoors for lengthy periods of time----it has to perform. But, increasingly people would like to know that they're going to be protected from odors, perspiration, bacteria. That's a big drive for us. Also, I think that in our sector particularly, looking at technology will help new constructions is important. There's a lot of people looking hard at stitching, and ways to overcome traditional stitch technology in footwear and hand wear product. And, there's work to do to engineer new materials to allow different constructions---seam sealing, welding---that's as true in leather as in anything else.

STEVE LUCIER – I think another big one is the sustainability issue, which runs across a lot of different fiber options from organic cotton, which was the leader there, today wool, post-consumer recycled, post-industrial recycled, soy, bamboo---there's a number of choices that are all good in many different ways. And, the challenge comes in how to use them in an application that is meaningful, and where appropriate to blend them together.

RICHARD ZIELINSKI – Good morning. I also think one of the biggest challenges we're facing is that fabrics have been evolving probably over the last ten years, with the bonding , the laminating, all kinds of finishes we're putting on fabrics---we're actually putting so much into it. But, I actually see the next biggest trend coming mostly again in construction techniques. Designers are now challenging us in product development to come up with more unusual designs, more ways of putting product together, etc. We're seeing an abundance of welding and seaming and bonding; but also putting knits and wovens together that normally you would not do. So, it's challenging manufacturers out there, in terms of equipment, time, and just delivering a product that's going to look good to the consumer. We can make one product look great on paper and sample it; but when it comes into production, we're really faced with some great challenges right now.

KATHY SWANTKO – *We're seeing more fabrics that multi-task, as Jim mentioned, These are fabrics that provide a combination of benefits, such as moisture management, flexible fit, antimicrobial protection, stain repellency, UV protection---all-in-one fabrics. Assuming the need for this type of value-loaded fabric is going to continue, let's talk about the challenges facing manufacturers, raw material suppliers, and contractors to produce these versatile fabrics, and still make a profit. Anyone?*

STEVE LUCIER –I can take that one. It's a challenge. I think the key thing here is communication with the customer. Coming from the knit side, we're working with the manufacturers and the brands primarily, and to some extent retail. There are a great number of tools out there. You put them all together, they have a very dynamic, yet expensive price point. It starts with what do you really need, and work backward. There's so many things we can do that it can be overwhelming. But, what it comes down to is communication. What does the customer really need? If someone's buying a jacket, and they're going to wear it to go to the mall, they don't need something that was designed to climb Mt. Everest, or go on a multi-week expedition. I think we're seeing less of that today, than in the past---that 'wanna be look'. I'll go buy it, because it's the best out there. I think that the consumer has become a little more realistic about what their needs are.

JIM MORELLI – I think that from our standpoint, stepping back a little bit in the food chain, for us look at it as how do we get the best value in a fabric or in a garment. The way we look at it is, and Kathy said it a little earlier, there's a coded game versus an inherent game. So, the more properties that we can build into a fiber, the easier it is for the next level of manufacturing---from a manufacturing standpoint of assembly, seaming, or whatever. It makes it a little easier, because they don't have to deal with a coded product afterwards. So, we think that that brings a value to the marketplace. But, as you walk around this show, you really see that fundamentally almost everybody makes all the same claims. So, it's really hard from a consumer standpoint to differentiate what's what. So, what it really comes down to from our standpoint is how do you measure it. And, Steve's right---what does the customer really want. How do you measure that?. And, how do you classify each of those performances accordingly?

MIKE DODD – The challenges for our sector, I think, are certainly the costs involved with additional chemistry you add on to a fiber structure, ultimately the more you have to pay. There's no escaping that. And, I agree that you really need to be very careful about what your customer does really want and need to pay for. Certainly, as well, the more you load chemistry on, the more challenging issues of feel and drape become to the finished product. So, construction has to be borne in mind with everything. So, often as a fabric supplier or a fiber supplier, your challenge to supply performance, but if there's little taken into account in construction to optimize that performance, then it defeats the purpose.

KATHY SWANTKO – *Dina, do have anything that you'd like to add.*

DINA PUGLISI – Yes. Not so much from the color and design aspect---But what we also do at Clariant is to create in our laboratories special performance finishing mixes for wet processing. We also do fiber finishing, and there are also a lot of other types of chemicals that we make. From the projects I've been involved in over the last six months, I'm hearing from our labs that there's an increased demand for more complex combinations of effects in the finishing mixes that they're working on. At that level, that's not necessarily where the cost is being put in. The cost from what I understand is adding pennies per garment to the whole thing. In that there are so many steps in the food chain between the chemical manufacturer and the garment producer, there's lots of other opportunities for additional processes to get involved. I think that streamlining the whole

production process in deciding what you want, and working with the chemical company, and every step along the way in the food chain to the point of the retailer, is going to help us to keep cost down. And, will help us understand how to do complex mixes of performance effects efficiently and cost effectively.

JOE WALKUSKI – I think the objective of combining multiple performance value propositions in one textile construction is perhaps the result of a phenomenon we've seen recently where many of the technologies in this industry have really plateaued. And, it's become very difficult for people in product development and throughout the supply chain to create those real clear value propositions that allow you to make a significant step forward, above and beyond what you are currently doing in either value or performance to the customer. So, people keep trying to pile more stuff on into one fabric. I would suggest that perhaps the reverse might be the better approach. Instead of trying to build so much into one yarn or one fabric, or one finish, which also compounds the problem that many people have here in this audience and at retail and point-of-purchase, is that it just gets to be so confusing for the customer. Where a more appropriate approach might be to really focus and fine tune on what does the customer require, and try to simplify what we are trying to do throughout the supply chain to more effectively deliver value to the customer. And, hopefully, give the supply chain the ability to deliver in a more consistent fashion, as well.

RICHARD ZIELINSKI – You have to choose where you want to be. You can't make everything for everyone in one garment. If you're going to be in hunting, then you want to make sure that you have the right things. But, maybe you don't want the anti-wrinkle finish or the stain repellency. You just have to choose, and be very specific. And, that actually makes our work a lot easier on our side. I have a philosophy that I'd rather have more stuff put into the fiber than into the fabric itself, because the more we pad on, the more challenge it is from a color standpoint. How can we control the color when we put so much finishing on this stuff. I can't get something to fit, because it stands up like this, (Laughter) and the designer wants it to drape. And, if you're a hunter---not a tree stand----or a snowboarder, you can't go down a hill like this or shoot a gun this way. (Laughter) So, I challenge my guys to put it into the fiber, and fiber encapsulation sounds like a great thing to me.

DINA PUGLISI – Or, you could work with the chemical company.

RICHARD ZIELINSKI – And, you're saying it's pennies---that's not what I hear! (Laughter) My cost just jump thre or four bucks a garment.

DINA PUGLISI – I don't think it was the chemical! (Laughter)

KATHY SWANTKO – *Okay, I think it's time to move on to the next question... Are environmentally friendly fibers and fabrics likely to be important over the long haul? How is this trend impacting new product developments along the supply chain?*

STEVE LUCIER – Going back into the study that's in Textile Intelligence, buying something because it was souly sustainable was number four or five on that list. So, the consumer wants to have his performance---anti-odor, moisture management, whatever it is---and, if there's an environmental story, then the product can sustain. Right now, the challenge is that environmentally friendly raw materials have tended to be more expensive. But now they are coming down and are a little more realistic. So, I think it has to be a return on investment all the way through the supply chain. Certainly at retail, they have to have something that will check out, and it's good to have a few reasons to buy. And, I think Joe made a great point of simplifying it. I don't think we can take that too far, but there has to be a few reasons to buy. And, in previous panels there's been discussions about really communicating what the benefit is, other than bundling a lot of technical information that some customers eat up, but others don't really care about. The important issues are: Does it keep me warm? Am I doing something for the environment? What will it do for me?

(Morelli) Clearly the environmental story is one that continues to grow, and most consumers are aware of earth-friendly products, whether it's what we do in the home of regular recycling of plastic, etc. In other markets, such as hospitality, environmental is also pretty important. In most of your hotels, you will see little cards at times that say, "Do we have to wash your towels every night, or can we do it every other night?" So, that consciousness is in the marketplace, and we as consumers all know that. But, generally earth-friendly means, we use a lot less of it, or we landfill avoid it. And, that definition becomes very important when your talking about apparel or a garment. It's like, will I really take my polyester wear and put it into the same recycled bin as I do my polyester bottles---my water bottles? That's a leap of faith from a consumer standpoint that is a little difficult. And, as earth-friendly as cotton may be, what do I do with that garment when it's done. These are a lot of questions from a consumer standpoint, or another bullet on the hangtag is important. And, is it going to be absolutely important in the end-all consumer buying habit---probably not. To Steve's point, it's probably number four or five down the list. But, it's something that we as manufacturers have to stay conscious about, and at what degree of earth-friendly are we participating. And, that's the decision points that need to be made.

JOE WALKUSKI – We're currently experiencing the second wave of eco-friendly fabric and technology revolution. The first one being about 10 or 12 years ago when organic cotton first came around. And, we did the recycled soda bottles in the fleece program that Patagonia led in the early to mid- nineties. Then, we thought that we were really on to something. But, like other quick fads in the marketplace, it kind of faded away. It faded away mainly because the consumer demands did not keep pace with the ways in which the technology was evolving. Nevertheless, the organic cotton movement has maintained, and in the recent past has actually strengthened, and is growing. Steve mentioned many of the other natural fiber

that are appearing again on the eco-friendly stage. But the question in my mind is, to what extent will this second phase be able to sustain itself within the marketplace. And, I'm hopeful and confident that other markets, such as the organic food boom, which in conjunction with what Jim mentioned, will help to fuel the consumer knowledge and perspective, with respect to eco-friendliness, and perhaps the value that that component might bring to a piece of apparel. So, I'm hoping that this time around that these technologies will have much more sustainability, and long-term legs than they had the first time.

MIKE DODD – Yes, I think people will look long and hard at the pipeline and the suppliers as well. Eco-friendly labels on a finished product are one thing. But, I think as consumers become more informed about the total debate, they will look hard at the manufacturing processes by which by which those products have come to market. They will look hard at packaging and ways to associate it with products, energy used in the conversion of those products, and social responsibility of the pipeline through which those products have been manufactured as well. It's a BIG BIG debate, and it doesn't just come down to the finished hangtag on the product.

KATHY SWANTKO – *It has always been technical innovations that have been driving the outdoor market. However, over the past few seasons, fashion has been growing in importance. How do you view the role of fashion in this market going forward? Is fashion changing the product development process?*

RICHARD ZIELINSKI – I'm fairly new to Under Armour, so I'm going to speak about it as it relates to my past life, and also as to what I see coming forward to my part of the market right now. I think that fashion definitely has its influences. But, I will be cautionary on one thing. Fashion can also kill your brand as well. You have to be able to take elements out of that. I guess the biggest part in the outdoor market that I can relate to right now would be snowboarders---that whole look that started from the streets and moved to the slopes, and went back to the street again. But also, fashion brings in elements of color. But, a lot of color doesn't translate into every sport. You don't want to see hunters out there in anything except camo. Do you really want to see mountain climbers out there in pink paisley? I don't know---maybe some people do, but it's a challenge. It may work as long as fashion can stay close to a brand, and build a brand. One thing that I know that fashion has done for a lot of brands is that it created body-consciousness, in terms of fit. For the longest time, clothes were just made to fit a body, but not to compliment a body. Designers have made it important to complement a body. At the same time in product development, we have taken that to another level, especially in performance products. We're very tuned in as to how we fit our product, and to maintain consistency in that fit. And that, I think all started from fashion. So, it's important. But I would also add that caveat to just be carefull, because fashion can also kill your brand. If you put all of your leap of faith into one idea, and all of a sudden that dies---you're stuck.

DINA PUGLISI – I think that fashion is a good thing for all categories, to some extent. But, I don't disagree with your comments. I think that if you are in sort of a clearly utility, functionally-driven area where color could be detrimental, you obviously need to work with them, and find out what works for the application of the garment. But, for the most part, once people have been introduced to fashion in a category, they don't want to go back because they don't want fashion options taken away. Fashion is the thing---and when I say fashion here, what I really mean is color. Color is the most important single piece of fashion, and we use color/fashion to stimulate the desire to update product, buy more product, buy product faster, etc. Lots of categories outside of apparel, especially in the home product sector, have gone from the utility product realm into fashion product with color and pattern---bedding, kitchen products,---not just textiles---also utility type items---have been sort of fashion-ized with color. It doesn't mean that the functional attributes of those products can be any less than what they need to be. And, I think the parallel is here in outdoor apparel. It's the issue of once fashion comes in, it kind of elevates the level of expectations of the consumer base. And, it's hard to pull back from that. But, it's a good thing ultimately, because once the consumer gets it in their head that they like the color, not just putting on the utility item, but actually feeling that they look good in it, they will be interested in wanting to change up that item more quickly.

STEVE LUCIER – Color also certainly has been driving it with many brands for a number of years. And, some of the challenges are to evaluate what that substrate is. If you're dyeing 100% polyester, you have one level of challenge. If you've got a high blend of spandex in there, the color-fastness issues, especially if color blocking darks and whites, or if you start blocking nylon with polyester, you're living on the edge. So, I think that it's important that the whole line communicate up and down of what is realistic, so that the fashion can be guided and enhance the product, and not ultimately create headaches and degrade the quality for the consumer.

KATHY SWANTKO – *With fashion and color becoming important, what problems does this pose? And, we've covered some of this. But, what problems does this pose for the manufacturing that is done in other countries, or in several different locations? In particular, what can be done to ensure consistency in colors, so that the colors produced are what was designed and ordered?*

DINA PUGLISI – Basically, the Archroma Global Services division of Clariant was created to address this problem. The brand owner or the retailer, controlling lots of private label product, basically can create or set standards. Color management is the standardization of colors, so that all players in the supply chain are working off the same page. It's setting a digital target for color that involves setting up a tolerance to that target that all suppliers have to hit. Basically, color standardization is that measurement. The standard is actually a number. But, because it's impossible to expect the global manufacturing community to go to digital color management overnight, we have created physical standards. So, we manufacture physical

pieces of cloth in colors. In Manhattan, we have a fairly large fabric library, representing just a fraction of the colors that we manage through the Archroma business. But, basically for each brand owner or retailer we set up a color library. The designers and merchandisers choose from that color library, and the standards are made available for purchase throughout the supply chain. And, we also support that supply chain with lots of help and information on how to actually formulate those colors for specific substrates.

JIM MORELLI – On the color management side, we encapsulate the color in the fiber. And, with that come a lot of control of what the color is, especially if color is the image. An, with that cost control and color control, we work closely with suppliers like Clariant to make sure that we have that consistency in the color, and drive it that way. The more encapsulation you can do in the fiber, the easier it gets for the people down the food chain.

MIKE DODD – In terms of color management, we do get panned on color on leather and variations. One of the things that can help our business enormously is concentrating orders on single batches where possible. Multiple repeating of business in the supply chain means that we're doing batch after batch after batch. The more batches we do, the more variation people are going to get. While one can try on some criteria that you have to insist on, all too often we see a tolerance taken from a first sample pack, it goes into somebody's product specification book, and it stays there. And, we get hung by that! Two years down the line, when everything is changing, including the dye stuffs supplied by the chemical companies, because they are a moving feast. So, give us as much help as you can with the order process, and we can respond. And, I'm sure that's true with the other areas here.

JOE WALKUSKI – That's actually the area of fashion that gives me the shivers. (Laughter) In spite of my schooling that goes back to the Fashion Institute, I continue to remain aesthetically challenged myself. (Laughter) Historically, it's been performance, performance, performance, especially in this industry. And, that's why a lot of us love working in it. I had something pounded into my head long ago, and that is---beauty is not optional. And so, if you take fashion to that extent, that's fine. But, if you start throwing in all of the traditional variables that "Seventh Avenue fashion" injects into product development, supply chain, and merchandising, it's going to be difficult. We're going to be challenged to maintain the functional attributes of the products that we've been delivering, if we try to incorporate too much into that (i.e. quick color change and quick turn over).

DINA PUGLISI – Well, we can help you. (Laughter)

RICHARD ZIELINSKI – And, for only a few pennies!! (Laughter) I have that written down. So, that's our next discussion. That's going straight back home with me. Sorry, Dina. (Laughter)

JOE WALKUSKI – There's two religions out there---- two schools of thought out there. There's the old fashioned way of doing color management, and then there's the new fangled way of doing it. Both have their pros and cons, especially if you try to accommodate the global supply chain, multiplying the different sources of a standard around the globe. It gets to be very challenging.

MIKE DODD – Just one final comment from our perspective, education is an important thing. And, trying to get across the message that something is actually----however you might measure it---electronically a half a point, or point two, or point three away, it's not the end of the world to the consumer, if that next garment is slightly different in shade. Maybe as we move down this eco-trend, we'll start to realize as we're doing with food that the perfectly formed orange, and 27 of them that looking exactly the same on the super-market shelf, is not nature. That's not real. That's not what happens. If you look at organic food, it doesn't have false color in it. There is some natural variation. And, the more we can do to educate down that trade, that will help us as well.

JIM MORELLI – Joe says it right, which is there are choices. There are ways to get around the color variation. But, it's got to be driven through the supply chain all the way back to the color supplier, whether it's through dyeing, or whether it's through fiber encapsulation, you have to find where in that food chain you stop the variation. And, your choices are in dyeing, or in fiber manufacturing. Those are your two choices.

DINA PUGLISI – I think a great point was made about setting the tolerance. We have clients who set tight tolerances, and their lives are miserable. We have clients who set much more realistic tolerances for their supply chain, and the system works beautifully for everybody. Color management does not work when you have no tolerance. I think a good point was also made how the variation of the colors on the floor, and how that registers with the consumer. We have one retailer that we work with who doesn't mind if they get lots of variance batch to batch, as long as it all looks good on the floor at any given time

RICHARD ZIELINSKI – I would disagree with that though, because as a former retailer, if my floor didn't look all the same shade, I'd be pretty upset. Especially, if you're selling product that is \$100, \$200, \$300, \$400, or \$500, you want a consistent color. And, I am going to challenge any of my main vendor that we make sure that we never move off our delta values. I mean, when you are paying a price, you expect it to be consistent, and that's how it should be!

DINA PUGLISI – It depends on your retail strategy.

RICHARD ZIELINSKI – Maybe if you're doing a natural fiber, and it's organic, and yeah you've got the variation, and that's okay, and that customer expects that. But, a performance customer who is used to paying \$300 for a top, or \$400 for a bottom, he wants to see the match top to bottom. He wants to see the consistency on the rack, and the retailer wants to see the same thing, I think.

KATHY SWANTKO – *Okay, well let's move on, and discuss something totally different. Let's go into cross-over trends, and let's look at the cross-overs of fabrics and technologies moving into outdoor wear from the industrial, medical, military, and safety & protective markets. What are some examples of this type of cross-over that you see coming into outdoor wear from other specialty markets? Steve, I'm sure that you have input on this, because you work in the military market. And, I would guess that you see cross-overs happening frequently in your business.*

STEVE LUCIER – The most interesting cross-overs right now, coming from very different directions and reasons, has been the focus on wool. While there are some great Merino options around the world, in the little world of military manufacturing things have to be Berry Amendment compliant, which simply means that all the raw materials processing has to be done in the United States. And, we've lost a lot of that infrastructure---that heritage. It's driven in the military by some very horrific conditions in the Middle East. You probably read about IED's, improvised explosive devices, which have been creating extremely serious injuries and death on our young soldiers. Polyester and the synthetics will tend to melt under this intense heat. So, there's lots of different things going from Nomex® that's totally flameproof, down to something like a wool. On the sustainable side, you've also got wool, but you've got broader options there. And, you get into the details of: How the sheep were raised? How were they handled and treated? The subject of mulesing is something that always comes up. It's not a pleasant subject when you really get into it, and you realize why people are taking some very strong stands against it. So, that's been one of the very common things crossing over between the two.

KATHY SWANTKO – *Mike, what about the leather side?*

MIKE DODD – Well, I think again that military tends to be driving a lot of what's happening at the moment., in terms of technical development, and in terms of the look as well. There's no escaping the amount of military activity we see on the news. And, camouflage is everywhere, and we have certainly been driven into camouflage patterns on leather for the large number of NATO forces that we work with. We have them in the booth. And, people in this segment and in other segments are looking hard at camo. We even have motorcycle suits being done in camouflage leather at the moment. And, I think that military requirement is going to drive a lot of technical development. Certainly, the flame retardant issues are very real. When you look at product in this sector, military is buying into performance gloves and footwear for extreme conditions. And, once you've made a product like that for military use, they'll ask that it be flame retardant. So, it goes back to the challenge of putting multiple chemistries onto the fiber structure, you can build something that's great for climbing a mountain. But, these guys risk being blown up once they're doing that as well, so they have another set of requirements, including infra-red capability that we're seeing on a lot of fibers and fabrics for military. So, I do think that these guys, because they are at the peak of critical performance at the moment, they're going to be back in the driver seat. And, we're going to see a lot of their requirements cascade down into other sectors.

KATHY SWANTKO – *Does anyone else have a comment on that?*

JIM MORELLI – Yes, Kathy, from our standpoint, we also participate in military development from a fiber perspective. We also look at other markets, like healthcare and medical. And, one of the big pushes from that area is personal hygiene. People want product that they know they can disinfect. They want to know that the garment is clean, especially if it's in a performance arena, and has ability, from our perspective, to be bleached, and it still comes out with the right color, the right look, and the right feel. This is pretty critical. So, the personal hygiene, or the ability to disinfect a fabric continues to be one that we see as continuing to grow.

JOE WALKUSKI – Keeping your eye out for what's going on in other markets and other industries must be a key aspect of any organization's research and development philosophy. I know, from a historical perspective, one of the best fabrics that we ever did during my Patagonia years, was actually a variation on a Japanese girdle that came from a completely different end-use application. But, we took that, modified it, and engineered it to meet our needs specifically, and it worked very well. A more contemporary example of a way that fashionable undergarments have affected our industry would be in the area of seamless knitting. Where we've taken what Victoria Secret and others have done in the area of seamless knitting, and applied them to functional outdoor garments. This is another example of how we've taken some cross-over technologies and made them successful. Jim mentioned medical. The application of silver ion technology in textiles, one that has been used for decades in the medical industry, is now being successfully applied by many of our partners in this industry. So, I think cross-over has, and always will be, a very important part of our overall R & D strategy.

KATHY SWANTKO – *The process of adapting a fabric or technology from one market to another requires that the manufacturer find the right partners within the supply chain. How do you facilitate the product development process; decide which technology/fabric to select; choose the right partners; and ultimately figure out how to make a product that sells?*

STEVE LUCIER – That's really the communication thing that we started with. As you go through the industry, you find out who those reliable partners are, You learn which suppliers are going to challenge you in a good way with realistic expectations,

while others may be challenging you for very unrealistic reasons. And, I think the comment was made that they are miserable. So, it's a balance. You want to do it as good as you can. You've got to be very up-front in the beginning. You've got to set standards. You've got to set specifications---what exactly are the requirements here. And, it's a matter of working backwards and forwards---getting intelligence from retail and from the brands that are closer to the consumer than the people here on the textile side. Determining what is the need. And, then bringing technology from the fiber, yarn, and fabric-formation side; and arriving at a solution that works. Sometimes it's not the perfect solution, but it can be a very good solution. And, it can be repeatable, so that we're not constantly tweaking the development during production. You want to get the development done, settled as much as possible. When you're breaking new ground, you always get a few surprises here or there in the early days. But, it's a communication thing---picking your partners wisely, and then staying with them.

JIM MORELLI – We look at it as it really is a people chemistry also. It really depends on the attitude, the mentality, what's the objective of either the garment manufacturer or the retailer. And, those attitudes have got to be cohesive. So, it's got to be product driven. But, at the end of the day, here's what the garment is at the retail level, what is the message to the consumer, and then we reverse engineer all the way back through color.

JOE WALKUSKI – Yeah, I have to say that the "C" word---communication has been mentioned many times here today, and it is absolutely paramount. Time and time again, characteristics of successful product developments are clear and concise communication throughout the supply chain, so that everybody understands what successive partners' requirements are and capabilities are. And, they need to be kept in balance, such that one's expectations does not exceed the previous resource capabilities. And, time and time again, failed development projects---the key characteristics of those projects---are failed communication. And, so that's why managing your data effectively clearly communicating expectations up and down the supply chain is absolutely paramount to being able to successfully deliver new technology to the marketplace.

KATHY SWANTKO – *Since fabrics and technologies originally developed for the outdoor market have application to the needs of other markets, will this change the product development process, in the sense that the target customer of a new fabric may now represent a broader group, cutting across several markets segments? (Silence) Have I stumped you? (Laughter)*

JIM MORELLI – We deal in a lot of different markets, from automotive to home furnishings into apparel---different variations of apparel. And, when we listen to product development cycles, and what people want to do, our mentality is to go back to other markets, and see where we have proven performances. It's a way to pick and choose from other marketplaces, specifically through that product development process, and capitalize on proven performances. There really isn't a lot of new, new kind of stuff. It may have to be packaged different. It may need to have a slightly different supply chain. But, there's not a lot of new, new stuff at this stage of the game. The next quantum leap of new, new is yet to be determined.

JOE WALKUSKI – I think that the perspective that one must have at the beginning of the development cycle---for example, is looking at alternative industries for ingredient technologies that you might be able to combine into your current developments. It's also important to have an open-minded perspective as you are developing and commercializing your raw material, as to what other cross-over markets can be affected by what you are currently working on. You're not only meeting the requirements of your core end-use application, or your core marketplace; but also what other opportunities might that raw material have to your line, and your organization, from a broader sense as well. That might allow you to capitalize on all of the hard work you've done throughout your supply chain to commercialize it and make it work. So, you hit your primary target. But now, what does that allow you to do with other end-use applications that would maximize the investment in your development, and increase revenue and bottom-line overall.

MIKE DODD – I think that's very important---the open-mindedness. We make it a point of sitting down with all of our major accounts, and telling them just about everything that we've got going on in the different segments that we operate in. We don't try to pre-determine what the golf industry might need, or what the outdoor industry might need. It's important that they see the totality. And, if they do, then we get some of the cross-over, because we can't think for all of our customers' needs.

KATHY SWANTKO – *Many product developments today are spec-driven. With that in mind, and with the constant pressure on price, is there a conflict between quality, price, and the retailer? Specifically, what about the pressures there are to loosen up specifications, and reduce quality in order to meet lower price demands that the retailer may ask for?*

RICHARD ZIELINSKI – Never! (Laughter) Never, Never, Never---No!! If anyone in my department tries to cheapen something---they're gone! In this market, or even in the fashion industry, or working in my past with the brands, you have a brand---you have something to protect! Your consumer already knows what you stand for. If you take one element out, and you've just turned her or him off forever! We sell \$30 t-shirts day in and day out by the thousands. And, whoever thought that someone would pay \$30 for a t-shirt? No questions asked. There are pressures to drop pricing, but we never will. In fact, we see prices going up, because the consumer likes our product, as well as liking some of the products that you guys out there are selling. And, why give in? I think, if you're selling to a mass marketer, there's where your pressures are. But, this is a very niched industry. We have some big companies out there that sell our product, and we hold our price line. We will not give in on anything! In fact, we will challenge them to come up with a better price---meaning, if I have to pay more for a fabric or a trim, we will, in order to deliver to the customer, because she expects it---or he.

JOE WALKUSKI – Dina, that's your opening! It's now a nickel. (Laughter)

RICHARD ZIELINSKI – However, it's still pennies on your side. (Laughter) I ask for the price, not you. (Laughter)

DINA PUGLISI – Well, I agree with the hold to the quality mantra.

STEVE LUCIER – Specifications are really the communication tool that we can use to say that it must be colorfast. Well, how colorfast is it? There are test methods to measure that. You may set a standard on a two-way wash that's a 4.5, which is very strong---5.0 being perfect. But then you come back, fashion comes in, and all of a sudden you've got 50 colors going in on a style. Well, you're probably not going to meet that on every single one of them, unless you make some price work (i.e. high energy dyes that are available. So, where you may be able to dye a basic black, and get the spec, it may cost more to get there. So then, it's a communication issue between partners in the supply chain---is this spec something that you will bend, or will you maintain your spec, knowing that it's going to be a little more costly to do so. So, the specifications are really the lifeblood of this communication. You can get lost. And, Joe, I think specification is something that you know as well as anyone.

JOE WALKUSKI – Yeah, through good times and bad, the spec is the communication vehicle that allows you to educate up and down the supply chain what it is that each other is expecting. And, in today's life, our soul purpose is to help people throughout the supply chain get their hands around that information, organize it effectively, and most importantly communicate it timely, such that we all have a better chance of delivering quality product.

MIKE DODD – I agree very much that if you have any kind of brand, you cannot sacrifice specification. You can work in different areas to add to your premiums, in particularly in performance areas. But at base level, if it's got your brand name on it, it has to perform. And, that's very true of our experience with the chemical industry. When we're buying certain dyestuffs that are commodity orientated, we know we can expect a very competitive price on a commodity orientated dyestuff. If it's got Clariant's name on it, we don't expect any diminishment of performance. That's the way the market works. They can charge a premium for the more difficult areas of the business, but you can't give away specifications or standards on the commodity area. If you can't afford to be in it, then don't be in it, or don't put your brand name on it.

JIM MORELLI – Now he's suckin' up!! (Laughter) It comes down to market segmentation. With branded product, this is the performance consumers expect. You can add to it. But, I think it would be extremely difficult to subtract from it. Then, you get into the mass market, and they're going to be looking for something like a little bit of a clone of what the branded people have, and want to try to get it out there at a lower price. So, market discipline is important. And, channeling and segmenting that customer base will define what kind of product you bring to the marketplace.

KATHY SWANTKO – *To maintain specifications that ensure quality; protect their image; and still make a profit, will manufacturers need to by-pass the retailer? And, do you see the Internet becoming more important in selling directly to consumers?*

RICHARD ZIELINSKI – The whole Internet thing---the E-tail, as we have referred to it in the past, is always going to be here. We have our own Internet site, and we sell quite well through there. We sell through retailers as well. I don't think you will ever lose the retailer, because this is a touchy, feely thing for the consumer. I think you capitalize on E-tail to push your brands to the people out in areas that just have any place to shop. And, I don't think it will ever go away. And, if I understood the question right, to go more to e-commerce to bypass the retailer for maintaining spec, I don't think so. It goes back to the same question we had earlier. We've got a brand to protect, and we're not going to cheapen the price.

JIM MORELLI – I think general consumers will try to find a brand, or a product that they like with a brand, and then they will try to shop the Internet to see if they can get it better, cheaper, easier, and all that kind of stuff. That's what we do as consumers, right?

RICHARD ZIELINSKI – I think that everyone tends to think that they're going to find it cheaper on the Internet. But, the only way you're going to find anything cheaper is on E-Bay, but then it's all fake, so----- (Laughter)

JIM MORELLI – One shot at E-Bay. (Laughter)

RICHARD ZIELINSKI – Oooo, I'm sorry-----Strike that comment. (Laughter)

KATHY SWANTKO – Okay, remember, this is going to be on a transcript! (Laughter)

RICHARD ZIELINSKI – I know. (Laughter)

KATHY SWANTKO – Okay, I think we'll stop here and open it up for questions. If you a specific panelist, you'd like to direct your question to, please do so. We have a remote mike, so wait until the mike gets to you, because we want to get your question on tape, and be able to hear it. And also, please give your name and your company name, and then go ahead and ask your question. And, you can direct it to anyone specific on the Panel. Does anyone have any questions? Yes, here we go.

(Mark Lazarus from Laztech Consultants) You brought up the point---the whole Panel did about misleading the consumer at point of purchase. And, one of the characteristics of products that is very misleading to the consumer is moisture management. Do you believe that there should be an industry standard set up for moisture management to control what gets to the consumer?

STEVE LUCIER – Mark, I'd maybe toss it back at you. I think, one of the challenges as long as moisture management has been around, is the unrealisticness of some of the test methods---the so-called vertical wick test, and the drop test are the two that are employed the most. You can get into sweating copper mannequins, sweating hot plates, which are time consuming and quite costly. So, it gets back to what are the test methods. If we could focus on that, I think it would really take some of the questions out for the consumer. But, it is quite a challenge going back to the test method.

JIM MORELLI – Mark, I would also add to that, I don't think the terms that we use on our hangtags collectively is misleading the customer. It's confusing to the customer, because everything kind of reads the same. So, always the implementation of some kind of standard, which differentiates products would be something that would be very consumer educational.

JOE WALKUSKI – Yeah, to an extent, I think that might be applicable and valuable. However, more importantly, I believe it gets back to the integrity of the brand, and the integrity of the company that's putting the hangtag on the garment. We all know that there are a given the number of variables in processing textiles. You can have one lot that comes out and meets your spec. And, there can be another lot that comes out, and through the artistic aspect of this industry, it's different and may not meet the performance standard. Yet, it's still got that hangtag on it, which contributes to the confusion in the marketplace. So, if you trust your brand, and your brand does their QC (quality control) and QA (quality assurance) appropriately, such that repetitive lots, repetitive colors, or repetitive seasons, continues to deliver a high standard of performance----then putting the trust in that brand, I believe, is perhaps more valuable than a standard industry test.

MIKE DODD – I'd agree with than. And, I think I'd bring back the construction element as well, in that we can all just about testify to the performance standards of our fabrics and fibers. But, that's a long way from saying that a particular garment performs well, or badly without having tested that finished garment in the construction that's finally been chosen.

KATHY SWANTKO – Any other questions? Yes, Tom, up here at the second table, the fellow in the orange shirt.

(**MIKE TINDLE**, Cotton Inc.) Is this really orange? (Laughter)

DINA PUGLISI – I'd say more coral, tangarine.

JIM MORELLI – Under what light source? (Laughter)

MIKE DODD – I'd call it 3784C. (Laughter)

MIKE TINDLE It's a very expensive color also. One of the things that we need to discuss is the durability of these performance finishes. What are your expectations, requirements, or specifications that you have for like UV protection, anti-microbial, or any of the performance finishes? What is the durability of these finishes? And, before you answer that, I'd like to make one comment about moisture management. Until we define moisture management as it relates to consumer comfort, and what they expect to get from that particular garment, then a number is just a measurement, and it doesn't really translate to what the consumer is going to realize from a moisture management fabric. Okay? So,---durability of these performance finishes. What do you expect?

DINA PUGLISI – When we formulate something. When we do a project, our durability is not dictated by an internal standard for the chemical. We sell for X. We need to know what our customer wants it to be, and then we'll do whatever we need to do to create that durability standard. So, am I addressing that?

(Unidentified Attendee) Yes, I guess that was three cents worth. (Laughter)

DINA PUGLISI – From where we stand, I guess we can give you as much durability as you want, and then it becomes a couple more pennies. (Laughter)

RICHARD ZIELINSKI – It all depends on your brand. If you're a brand that's going to go with Under Armour, it's the life of the garment. You could go to a mass merchandiser and pay \$10, and it would list five washes. So, it all depends on where your company is setting the standard.

MIKE TINDLE I guess the life of the garment to the regular consumer would be what----20 home launderings, 30 home launderings?

DINA PUGLISI – I don't know. For this category, perhaps. But, in our business, we do work in many categories. And, I just finished an underwear project where it's better lingerie, and the durability requirements of the brand were surprisingly low. We set the bar way higher in our lab work than what they wound up settling for. So, it depends on what the product is, what the substrate is, what you think or the brand's consumer needs it be.

JOE WALKUSKI – I would agree. Unfortunately, there's no set number to answer your durability question. It depends on the end-use application, the customer, and more importantly---the integrity of the brand. To set those values.

MIKE TINDLE That's what we're finding.

JOE WALKUSKI – And then, with respect to your comment about comfort---vis-à-vis moisture management---I think you're absolutely correct. That's another reason why I don't think that a standard for moisture management testing is perhaps all

that valid, because you've got so many variables in your fabric construction that go well beyond simply in its ability to move liquid that would or would not translate into total comfort for the wearer. It gets down to the way in which the company, and the brand designs or engineers their raw material to meet their specific end-use application. And, the way that they're set up to deliver on that time and time again to build the brand integrity, upon which you can base your "durability values".

MIKE TINDLE Can I make a plug? We have an excellent presentation on cotton sustainability tomorrow morning at 7:30.

KATHY SWANTKO – It's getting close to the opening of the show. It's about 20 minutes to nine. So, if anyone here has to leave to ready their booths for the 9:00 opening, please feel free to leave at this time. We'll continue to answer questions. I just want to give you permission to leave, and also to remind you to fill out the opinion sheet, which you can leave at the back table. Alright, next question. Yes, the fellow in the yellow striped shirt---orange stripe shirt. (Laughter)

(MARK KASHIN from Transpor Dry Layer) Thank you. We have a moisture management fabric, and we participate in the arena that many of us do, and have that big challenge of measuring moisture management. And, just to come back to the testing methods---and I'm not sure if everyone knows that SDL Atlas now a machine called the MMT, the moisture management tester that was invented at the Hong Kong Poly Technic, and then they bought the patent from them. And, that is now available from them. And, we bought one of those machines. And, the results are surprizing when you test the fabrics. And, it may be worth looking into. It's going for the AATCC standard now, and they expect that to be passed through very soon. So, I think that the wild, wild west time of moisture management is coming to an end. And, now the brands that are putting the claims on the hangtags are now going to have to be able to prove that. So, I think there's some light at the end of the tunnel as far as measuring where the moisture travels in the fabric. It's a fantastic machine, and for a mere \$25,000 (US), you can own one. (Laughter)

KATHY SWANTKO – Not just pennies, huh? (Laughter)

MARK KASHIN It's from SDL Atlas, and like I say, it's an amazing machine and it's showing great results. So, there's some light at the end of the tunnel.

JOE WALKUSKI – So, your fabrics test well on that machine?

MARK KASHIN Our fabrics always tested well, even without the machine. We can do it with a paper towel, and show how ours work better. But, I think what it comes down to is the legitimacy of the claims being put on the hangtags.

JOE WALKUSKI – Absolutely.

MARK KASHIN Some of those hangtags read like a novel, and none of it's true. But, there's never been any checks or balances in this category. And, when you're sending out people that may be in a life or death situation, and saying that it's pulling moisture off the skin, and keeping you warm. And, it doesn't do that, then there's not just ethical claims there, but I would also say that there's legal claims that people may get into trouble with in the future. It's not our machine. We didn't invent it. But, it's out there. And, it's available. There's now a test method.

KATHY SWANTKO – *Okay. Any other questions. Yes.*

(My name is Chris, and I'm with New Balance) I have a question that is probably most appropriate to Richard. I walk around the show, and there's a ton of materials that maybe I'm not exposed to from our materials library. And, I'm wondering when you do look at materials from other industries, is there a place, a resource, or a combination of resources that you guys use, in particular, to find out who that vendor might be, and how you can get some samples?

RICHARD ZIELINSKI – I really can't tell you how we do it. But, it's probably the same way that you're doing it right now. That's a good way of doing it---just walking through the show, and seeing what's out there. We have a very set system that's proprietary. But, what you're doing is the best way. You go out, and you look, and you shop, and you see what's going on. Eventually, you'll find out who made it, and you'll get to that right person.

STEVE LUCIER – Another way, may be to walk trade shows outside the industry---whether the industrial shows, etc. Also, a lot of technology comes from the fiber/yarn producers---their web sites can lead you to industry partners downstream, and also give you an overview. FabricLink is also a good source to take a look at. It's kind of a clearing house for many aspects of the industry.

DINA PUGLISI – There's a material resource center in New York called the Material Connection. Are you familiar with that?

(Chris) Yeah, we're actually subscribers of that. And, they have been really useful for a lot of things.

KATHY SWANTKO – *Any other questions? Yes.*

(David DeBush, I'm with Sports Authority) Over the last, say 12 years, we've seen many brands innovate, and come into market. And, the two that come to mind as being very well established are Under Armour and Smartwool. Certainly, these companies are still growing, but I was wondering, can you name any brands that we can look at, who are in their early stages of development?

RICHARD ZIELINSKI – Are you looking to buy stock? (Laughter) Does that go against the rules?

KATHY SWANTKO – *Rules---we have rules?*

RICHARD ZIELINSKI – I have no comment on that one. I'm sorry.

KATHY SWANTKO – *Does anyone have a comment on this?*

JOE WALKUSKI – I have one. There's a new brand coming out of Portland soon that I think you'll be hearing more and more about in the near term. The company is called Nau---N-A-U (pronounced "now"). It's something to be looking out for.

KATHY SWANTKO – *Any other questions? Yes, here in the front row.*

(Unidentified Attendee) My question goes back to the sustainability, and sort of the second wave of cultural connection on what we need to do as suppliers, manufacturers, and the supply chain. When does sustainability become the expected versus the anomaly, or part of the proposition. I think more today than 10 or 12 years ago---I remember that the whole organic cotton phase---and today, now I think we're more informed. I think, on a global scale of it, we're just a lot more connected to the global events that are affecting sustainability. We walk the show and see a lot of the suppliers at the show offering their versions of eco, wool, etc. So, I'm just open to anyone on the Panel about when do the manufacturing standards start to become expected versus a marketing proposition?

JOE WALKUSKI – My personal hope is that it will take a long time for it to become expected, as moisture management is expected today, because by the time it reaches that point, it will be as diluted as moisture management is today. So, I hope there's a period there where we all see much greater value from sustainable textiles in the marketplace, throughout the supply chain, than we do right now from the few cents it costs to apply somewhat of a wicking finish to a fabric. So, that's my perspective. I hope there's a period of great value in there, before it becomes expected. But, I think, more importantly, there's pull and then there's push in the marketplace. And, this industry is known for its push---it's technological push. We come up with new things, and we push it on the retailer. And, we push it on the customer. And, part and parcel to that is education. And, the better we are at educating you, the retailer and the customer, the more sustainable the technology will be, in that the customer will be asking for it and turning that push into pull. I think that was a key factor in the first wave's inability to sustain itself. And, I'm hoping that that is something that we as an industry can do to educate the customer, so that they understand the value of an eco-textile component today. We need to extract value from it, and through that education, build the pull to give us all longer life.

(Unidentified Attendee) I would agree. I'm hoping that, even more than 10 to 12 years ago, just the global---the things that are surrounding us in the culture of the global connection to---whether it be whole foods, or other things---that things are growing at huge rates, and it's in people's conscience. It's obviously in cars, and obviously in growth in other places in the world that we haven't seen in quite awhile. So, hopefully, there's a fast track---that it won't be diluted, because it's accelerated to the point that it's no longer a fad, and becomes a standard to which we all need to live our lives.

JOE WALKUSKI – When we did the first wave back in the early 90s, it was mandated by corporate ownership. Today, the drive is part and parcel the increased education at the consumer level---vis-à-vis the organic food, and that type of movement, which is fantastic. But, there's also a strong drive for innovation and development from the R & D people that is building that momentum again, as well. There is something happening in the near term---without mentioning any names---that represents further, much larger scale corporate dictation---large retailers saying "we will do this! We will incorporate sustainable textiles into our product, without having that pull from the consumer." So, there are sort of these opposing forces that are at work here right now that I'm hoping will translate into long term sustainability at retail.

(Unidentified Attendee) I guess my last observation would be when you consider the automotive industry 10 or 15 years ago, there was never a big pull for hybrid technology. Clearly, there's more of a pull versus a push now, because of global events. So, for me there's some parallel at some point that it could go into a pull mode, once the consumer is educated, and all of the peripheral information is digested. I think it's going to affect everything that they purchase at some point.

KATHY SWANTKO – *Okay, any other questions?*

Since there doesn't seem to be any other questions, I think we'll stop right here. In closing, I want to thank the members of our Panel for giving their time and sharing their expertise. I think that this Panel has provided some great ideas on using effective merchandising techniques to guide the sale of textile-based performance products, which will ultimately provide a more enlightened "Point-of-Purchase Experience" for the consumer.

Thanks to all of you for attending. We hope this has been a valuable experience. The transcript for today's Panel will be available on the FabricLink and The Technical Center web sites.

Also, please leave your blue opinion sheets at the back table or with any of us. Remember to turn in your "Golden Ticket" to Ann Stables to claim your prize if you were one of our lucky winners!!

Thanks again for coming, and have a great show! (Applause)