

THE BROOKINGS INSTITUTION

EDUCATION REFORM EXPERIENCES ON THE GROUND:  
IMPLEMENTING A LEARNING AGENDA

Washington, D.C.  
Monday, April 2, 2012

PARTICIPANTS:

**Moderator:**

REBECCA WINTHROP  
Senior Fellow and Director, Center for  
Universal Education  
The Brookings Institution

**Panelists:**

MARIA DE LAS MERCEDES MIGUEL  
Director General of Education Planning  
City of Buenos Aires, Argentina

CAREY WRIGHT  
Chief Academic Advisor  
District of Columbia Public Schools

SIR MICHAEL BARBER  
Chief Education Advisor  
Pearson International

\* \* \* \* \*

ANDERSON COURT REPORTING  
706 Duke Street, Suite 100  
Alexandria, VA 22314  
Phone (703) 519-7180 Fax (703) 519-7190

## P R O C E E D I N G S

MS. WINTHROP: I'm Rebecca Winthrop. I'm the director of the Center for Universal Education here at Brookings. We appreciate you sharing part of your wonderful sunny Monday morning with us.

We are waiting for our third panelist who is based in London as we speak to show up on the video monitor, so he may pop up on these screens in a moment.

So basically what we are talking about today is looking at how we move from policy to action on the ground, particularly around implementing reforms that improve learning for kids. Just to give you a little bit of a background, I see several familiar faces but a lot of new faces as well.

The Center for Universal Education here at Brookings works primarily on looking at education in the developing world. And we are very focused within our team here on trying to shift the global discourse from inputs to outcomes, and particularly we're working hard to think about how we can think strategically about policies and investments and practices and strategies that can improve learning for kids around the world, for children and youth, as well as thinking about how to reach the most marginalized kids so that they can get access to education that is hopefully of good quality.

And some of you may be familiar with a report we put out a little bit ago, last year, called the Global Impact on Learning that talks very much about that. A number of recommendations that we've made are coming to fruition. One of them is around engaging with a lot of international actors having sort of a global discourse around what are some basic standards that we should be thinking about for learning, particularly in low income and middle income countries? And how should they be measured? And if anyone is interested in engaging in that dialogue please let me know.

And of course, the inputs to that discussion will be lots of examples and tried, you know, things failed, things successful. In schools, in municipalities, regions, countries around the world. And we're very lucky to have a great panel today, particularly looking both at Buenos Aires and here in D.C., how just that type of a thing has been tried.

So let me introduce the panel. You guys have full bios in your packet. So I'll just, very shortly, Maria de las Mercedes Miguel is the director general of education planning in the city of Buenos Aires. Carey Wright is the chief academic officer here in Washington, D.C.

MS. WINTHROP: Sir Michael Barber is the chief education advisor for Pearson International, who is currently sitting in London and will be for all of you on the screens through the duration of our panel. This is Brookings' attempt to get into the 21<sup>st</sup> century.

So thank you to all three of you so much for being here. We're really, really pleased. And basically I think we'll start off with you, Maria, but both for -- all three of you. Just to let you know, some of the questions that I'd be interested in hearing answers to as we go along or in the Q&A one of the things I'm constantly wondering about is when we think about it, assessments and testing how much weight do we give around student performance, particularly for teachers given that students have a range of -- come to school with a range of backgrounds, a range of different abilities, et cetera. So how do we balance that?

And I'd also love to hear, of course, from the two of you. I know they both know each other very well. And Maria has certainly looked at what Carey has done a lot here in D.C. and tried to apply it to Buenos Aires. So it would be interesting to

hear how do you take something from the U.S. and apply it to Argentina? And what does that look like? But I'm sure you'll also have many other things to tell us about.

Maria, why don't we start off with you.

MS. MIGUEL: Okay. Thank you so much. I'm very pleased to be here. Thank you so much to Justin for organizing, and Rebecca, for inviting us.

I would like to start telling you -- well, you have my presentations so I'm not going to go through each part of the presentation. You can ask whatever you want. It's the one that you have in your hands. But we have only 10 minutes. I would love to start telling you that fortunately it's an honor for me to be here with Carey and Sir Michael Barber. I took to implement the educational policies that we are running in Buenos Aires City. I will target both cases -- D.C. Columbia's cause, and the instruction to the little book of Sir Michael Barber which I deeply recommend.

When we took office in February 2010, we were -- the Minister of Education, Esteban Bullrich was the third minister and Mauricio Macri, the governor of administration. There has been one minister of education. Then the second minister for 12 years -- 12 days, sorry -- and then we came. So when we started having meetings people were looking at us like how long are you going to last here? Are you going to last for 12 days? 15?

So the most challenging part of taking office was to map the situation. Where are we standing and what do we have to do? And reading Barbara's book at that moment for me was really perfect. It was like bringing light to what we were going to do. And then I met D.C. Columbia's cause IMPACT program and I said I have to take a plane and I have to go and visit these people. So I went to Carey's office. And how do we do? Well, in Argentina we -- I'm going to be short in this, but my country is waiting -- is

investing 6.4 percent of the GDP in education. But they are not paying attention to what is going on with that huge investment. They are not looking deeply at student achievement or teacher development or improving the profession.

So what we are doing in Buenos Aires City, the first thing that we did was to create an evaluation department. And this is -- maybe for you it is like no news but in my country, talking about evaluation, talking about assessment, talking about teaching assessment, it was like impossible. We had strikes just for saying that we were going to evaluate teachers. So we took the IMPACT program and I also started Barbara's book like -- talking about how to make things happen. And we started writing documents and papers to tell the whole system what we were going to do. And what we did, we gave out every single score. When we went to the office there was no Internet and schools were using faxes. Our educational system in Buenos Aires City is exactly like New York City, more or less for you to have an idea. We have 50,000 teachers.

So the first that we did was to put Internet in every school and we provided an e-mail account to every principal and every teacher. And we also developed and gave out 170,000 computers, personal computers. Every teacher has a notebook and every single student in primary school, public schools, they have a netbook. Supervisors have a notebook and principals in secondary schools have a notebook. So we have started 600 teachers going around schools to improve teachers' use of digital education inside the classroom.

But, we have also started assessing. What are we assessing? And this was a huge question. What do we look at when we look at what they are doing? And here comes IMPACT. And you will see in my presentation that we took from IMPACT these three great, which Carey is going to explain much better than me, but we took

these three huge and simple areas to start working. Planning, improving students' assessment, and teaching. So we've started teaching, evaluating, and assessing students in 2010, as soon as we came into the office because Bullrich, the minister, is always saying we are in the office right now. We have no time to waste. In my country you can be out of your office at any moment. So we are really dedicating 24 hours a day to improve what we see that must be improved. After a huge economic and social crisis in my country in 2001, schools, public schools became the best place for kids to be. No matter what they were doing down there, but they were at school. So the minister of education was more like a development, human development ministry than education ministry.

So what we tried to do, and this is your third slide, we really thought about two stages. First things first. What did we have to do? To arrange teachers' salaries and to arrange schools. That was the minister of infrastructure. The only educational agenda for a minister in Buenos Aires City was to pay salaries, to avoid strikes, and to have schools in condition. So those were the three very first things that we did during 2010.

In 2011, there was going to be a re-election and our major governor, Mauricio Macri has been re-elected. So we sit with down with him -- and this is a very important thing -- to implement reforms and public policies, educational policies. You do need huge political support. We have like 10 strikes in the last two years for different reforms that we were announcing to the system. And we never gave up. If we said we were going to evaluate teachers, we evaluated teachers. We are going to assess students and we have assessed students, although we were having very tough situations. I visited personally more than 150 schools to talk to teachers and principals

and supervisors to explain to them that assessing them, evaluating them was not to put them on the corner as we say in my country when you misbehave, a student misbehaves. Not now, fortunately, but many years ago they stood you at the corner of the classroom facing the wall. So they thought that we were coming for them and we were doing these just to bother them. They've been doing this teaching like that for many years, like 50, 40 years. So why are you coming here and doing all these terrible things to me? So we had to explain that assessing was for improvement. We cannot improve what we don't know.

So what we wanted to do was to know how teachers were doing inside the classroom, and we did it. We did a very, very tiny evaluation in 2010. We were just inside the office of administration and Minister Bullrich said, "I want to see what teachers are doing." "Right now," I said? "We have just arrived." "You have no time. You do it."

So we did it in December 2010, a very tiny evaluation. But the best thing was that teachers told us thank you so much. Finally, someone is paying attention to us. We are so alone inside the classroom. No one cares about us and those teachers in very, very disadvantaged areas are the ones who mostly need our attention. And what we were saying -- and last year we evaluated 250 teachers and this year we are going for compulsory evaluation to every single teacher in Buenos Aires. So I will give you a call, Carey. I will take you to Buenos Aires City.

And the good thing is that last year when we did it for 250 teachers, we made a survey. And in that survey 98 percent of the teachers said that they really felt this was for their improvement. So we know with a very humble way we try to work every day near schools and near teachers and principals because what we've seen is that when we talk about assessment we are not just looking at the teacher. As I say or as we think, teaching, evaluating is the daily bread of every single teacher. They are always

assessing their students. So why weren't we going to look at what they were doing? If we can help teachers to be better, we are going to help the whole system because what we also think is that we are not just talking about teachers; we are talking about students. We are talking -- that is why you will see that we talk about putting the student back in the middle of the system.

When we arrived, in my country, in Argentina, the educational system is about teachers and salaries and workers. They call themselves educational workers. And they are teachers who have to bear in mind that what they do with those students and most of all those students -- the only thing they have in their lives probably will be having a good education. And if we don't give them the best education that we can during their years at school, maybe no one will give them ever never nothing or anything.

We are providing students with lunch. We are providing students with breakfast. We are providing students with textbooks, with literacy books. We do give four million books a year in Buenos Aires City. Every single students receives the textbook, English textbook and Spanish textbook. We have compulsory English in every single public school since kids are in first grade. We are teaching them the second language, which we believe is very important. But the most important thing that we have to give them is knowledge. And this is a battle that we are going through right now.

So when we have to explain what we are doing we say -- Bullrich says, the Minister of Education says all the time it's all about people. So that is why we really believe. That's why we invested so much money in technology, to be near them because who was dealing and who was handling the information inside schools? Teacher unions. They were translating what the Ministry of Education wanted to do. And, of course, it was not the best translation.



So now, what we are doing now is improving very deeply what are the assessments that we are doing? We are evaluating our evaluations all the time. We evaluated last year students in primary schools. Every single student leaving secondary school, every graduate. We've run 26,000 tests, math and literacy, to see how well were students leaving school. And we are going to have that test every single year. We started last year. This was a huge investment and this year we'll try to do it online because everyone has the netbook and the notebook.

We also evaluated 12-year-old students and 15-year-old students, and we are standing for the very first time in my country for an evaluation at Buenos Aires City. Argentina is sitting for the evaluation and Buenos Aires City is going to afford a huge investment to sit for peace at Buenos Aires City. We really want to see how things are being done, and we are working. We cannot say standards in my country. It's a very bad word. So we are talking about learning objectives.

I took the team. The first ones -- because we didn't want to evaluate the students and the teachers -- was my evaluation team. So I had to change the director and part of the team. I had three months of debate and discussion with my team explaining to them why they should work on the evaluations. They didn't want to. I'm not going to evaluate my peers. No, but listen to me. You're not just evaluating them. We are going to work together to improve what they are doing.

Today everyone wants to work. Can I participate? And we are taking the seven test teachers from last year. They are sitting down on the table this year to work on the tests because we want to listen to them. We really want to understand what they are needing. Why? Because we know that this has to be every single year and we are creating. It doesn't exist in my country but we are creating in Buenos Aires City an

external agency -- quality and evaluation agency. It's going inside the Congress, the bill you say when it's not a project. Right now. So assessment, but now we are going to be focused on improvement. That's why we are going to change secondary schools.

And here I bring another huge book I read and it was perfect. It's Tony Wagner's Global Achievement Gap where he describes in a very deep way what is going on inside America's schools and I felt deeply represented what is going on inside Buenos Aires City schools. It's very interesting because I've read Barbara's book from England and then I started an IMPACT program in the United States and believe me, I've found so many things that are very similar. And we are facing very similar challenges no matter where we are but doing reforms has to do with working with people and convincing people of what you are doing because we are bringing something very different to what they have been doing for many years.

So I don't know if I -- I don't want to make the audience sleep.

(Laughter)

MS. WINTHROP: There will be lots of time in Q&A.

MS. MIGUEL: If you want, I don't know if I have a few more minutes or -- are we okay?

MS. WINTHROP: Why don't we turn to Carey and then we'll have plenty of time for discussion afterwards.

MS. MIGUEL: Okay.

MS. WINTHROP: Thank you.

MS. WRIGHT: All right. Good morning. It's a pleasure to be here.

I kind of wanted to give you a little bit of a background in how actually we came to meet. I've been in the District since 2009. And so the first couple of years that I

was here, Chancellor Rhee hired me as the deputy chief for teaching and learning, and then at the end of the first year promoted me to the chief academic officer. And part of her carte was to improve obviously the instructional program in the District.

At the time we were implementing our IMPACT system, which was just beginning. The diagram that you have, the heart of it is really what the IMPACT system looks at. For the first couple of years we were really only looking at the green portion, which was the teach part of it, and working with teachers to evaluate their performance based on those aspects. And the teaching and learning framework, which is what you see were in the center, was really just designed after what good research was telling us about what good teachers should know and be able to do in the classroom, but we really only focused just on the teach for the IMPACT. So when teacher principals were coming in to observe or master educators were coming in to observe, they were really only looking at that one portion of the teaching and learning framework itself. But what we kept hearing from teachers was, I think I'm really getting the hang of this but I'd love to have more of the "what" to teach. Because they didn't have a lot of curriculum in front of them.

And so we stepped back. It was also at the time that the Common Core State Standards were being adopted across the United States. We, and D.C., adopted that as well, and we thought what a perfect opportunity using the Common Core State Standards to give our teachers the "what" they wanted, which was the content, so that became part of that plan aspect that you see on the circle. And at the same time we also wanted to introduce paced interim assessments, which is what Maria was referring to earlier. We really wanted to be able to have an opportunity to assess children on what they were expected to learn over a portion of time. So we developed a scope and

sequence document. Kindergarten through 12<sup>th</sup> grade in English language arts, and we developed scope and sequence documents in mathematics.

When we took a look at our state assessment, the DC CASS, the state assessment was very well aligned to English language arts but it was not very well aligned to mathematics. So we said let's start this year, which is our first year of our academic plan rollout, which we knew was a huge need in the district, and so we felt very comfortable with that in our paced interim assessments. So at the end of about a five to six week period of time of what students should have been instructed we administer a paced interim assessment. And then within four days teachers get those results back. So we really felt that this was a good opportunity for us because what we were using, the assessment was more comprehensive and it wasn't really assessing what teachers should be teaching and what children should be learning.

So as part of our academic plan we felt if we focus on literacy, to Maria's point, we also needed to provide our teachers with the support that they needed, whether it was content-related or whether it was on the teach aspects of their teaching. So we rewrote the job description for the instructional coach. Every school had an instructional coach who should be coaching. And so we said, all right. Then how are we going to do this? We need them coaching in two different ways. We need them coaching on a daily basis on the teach part of it, so on the green part. So if I'm observed and I do not so well on say teach 3 and teach 7, then I can go to my coach and say can you work with me on that? We develop modules for the coaches to be using. We held professional development so teachers could come and receive that kind of support that they needed. And so that was really the first part of it, that individual one-on-one coaching.

But as we were rolling out the literacy part of it in our English language

arts curriculum, we also knew that teachers may need help with the content, but that we thought would be a good idea for them to work in groups together. So whether that was all reading teachers or all second grade teachers or whatever the case might be, that same coach was going to be coaching groups of teachers in content. So teachers could get help individually and they could get help with a group with content.

The various aspects that you see around this wheel are the various aspects of our academic plan that we are rolling out this year in the District of Columbia around literacy, and next year you're going to see something very similar but it's going to have to do with mathematics. So for the first time we implemented the Common Core State Standards. We drafted a scope and sequence document that mirrored the Common Core State Standards. We developed units for the teachers. So once again that was the "what" part of it. And then as we moved into literacy we knew there were several things that needed to be done. At the elementary school we needed that 120-minute literacy block. Very focused. The Common Core State Standards talked very explicitly about the foundational reading skills, and so we knew that teachers -- we needed to design that 120 minutes, and every single elementary and EC so the children could be assured of getting those kinds of foundational reading skills.

We also lifted up -- we worked with David Coleman, who is one of the primary authors of the Common Core State Standards. He came to the District. He worked with us because there were some key pieces that we knew that the common core focused on that we had not been focusing on as much. The close reading of complex text, the increase in the amount of informational text the children had to experience. Most times teachers were teaching the literacy part of it or the literature part of it but not the informational text. And, I don't know about you but when I hit college, learning to

read a college textbook was a whole lot different than picking up my favorite literature book and reading that. And so we needed to teach children how to read those informational text. And then the learning cycles I just spoke to you about whether they were individual learning cycles, one on one with teachers or whether they were content.

And last but not least, and Maria talked a lot about this, was assessment. If we were administering the paced interim assessments, we needed to teach teachers, we needed to teach principals, and ensure that those academic leadership teams were using that same kind of eyes looking at a data cycle. What does that look like when we look at data? How do we interpret data? How do we analyze data? And most importantly, once we do that, how does that inform what we do instructionally? So when we get these results back it's important for us to know what children did well and what children did not do well on, but then what? It's like of the like the so-what. So we had to show people how then to take that information and either know how to reteach and reassess, which is a really critical skill, or as they move forward, what were certain aspects that they knew that they would have to loop back in together?

But at the same time we knew it was important not only to provide this professional development to our teachers, but we needed to provide this professional development to our principals and assistant principals because they were the ones that were going to be coming in the classrooms and doing the observing. So our leadership academies we have about once a month with our principals and our assistant principals. So we aligned all of our leadership academy content with what we were also doing with our teachers. So the principals knew what was expected, teachers knew what was expected. And we launched all of this last summer for the first time ever. We had a two full week summer leadership academy that involved every principal, every assistant

principal, every instructional coach, every lead teacher, and every school's academic leadership team. So we basically immersed them for two full weeks in what was coming this year in terms of the rollout. We are also in the process of doing that planning now because next year's focus is going to be on mathematics while we continue our focus on literacy. And so we want to make sure that they're immersed in that as well this summer.

We also made sure that our professional development days, we allotted time for those academic leadership teams to come together and look at the data. So we planned the assessment right before the professional development day so that the results would be back so we had that just in time kind of information for our teachers and for our schools.

I think one of the things that we also did was we really tried to listen to what the feedback was that we received from our principals, from our assistant principals, and from our teachers. We asked our teachers every single time they complete a learning cycle to fill out an evaluation. And our focus is did it help you become a better teacher? Did it help you instruct -- were your children learning because of this experience that you had? And so that feedback was then used to work with our coaches because we meet with our coaches once a month and we find out what's going well, what's not going well? Where do you as a coach need help? Where do your teachers continue to need help? And all of that information is being fed back into the central office as we move forward with the planning because it's only as good as the execution and as good as the people are feeling that it is benefitting them as individuals and as professionals.

We then felt it was really important for us to use our highly effective teachers. So as we are starting to craft some of these documents for teachers we pulled

in our master educators. We pulled in our highly effective teachers and said here's what teachers are telling us that they need. Give us your best thinking so that by the time that this ends up in teachers' hands, teachers are going to feel confident that it's not some folk sitting up in a room doing this all by themselves but we've been using their colleagues to do this.

To roll out our math, we've even formed what we call our common core math core. So we pulled together about 50 of our most talented teachers and our master educators, and we are meeting with them now and have been on an ongoing basis on a variety of things. We want to make sure that as we're planning our summer training that we have their best thinking around what do teachers need to have in their hands in order to roll out the Common Core State Standards in mathematics. We been using our kindergarten through 2<sup>nd</sup> grade Common Core State Standards in math this year because K-2 were not assessed and we did not feel that it was fair to teachers or to children to then use Common Core State Standards this year in mathematics and then turn around and assess them on standards that weren't taught.

Now, the following year we've been working with the state department here in D.C. to redesign that state test so that it is aligned. So as we are moving into teaching Common Core State Standards next year in mathematics, then when the DC CASS hits the following spring it will be totally aligned to what the children have been learning and what the teachers have been teaching.

Part of the -- last year we were kind of rolling out these unit overviews as quickly as we possibly could, and so what we're trying to do is lessons learned for us is to get ahead of that. And we've been designing those unit overviews for math as we speak. We'd like to get those up and loaded onto our portals before the end of the school year



so the teachers have them available to them during the summer. We have two portals that we use a lot in D.C. We have an administrator portal where we post all of this information. We've got an educator portal so that teachers, whether they're at home or whether they're at school can download whatever information it is that they need, whether it's the scope and sequence, whether it's the unit overviews, et cetera.

We also then have aligned all of our spending to this. So it was important for us to get materials in the hands of teachers. So in about a month's time we were fortunate that we had some money that we could spend. We bought leveled readers for our teachers. We bought read alouds for our teachers. We bought level texts for our teachers. We bought a ton of informational texts for our teachers because that was something that we knew we did not have.

So we've been trying to buy as many materials as we can. We bought mathematics manipulative kits. And along with all of that came the professional development. It wasn't just here we're buying the kit. Here it is. Good luck using it. It was here, we're buying the kit, and we're providing the professional development that you need in order to implement this well.

So we've really been trying to be reflective as we've been doing this and also to get ahead of the curve so that teachers are feeling confident as Maria said. This isn't about a gotcha mentality. This is about how do we improve the craft of our teachers? I was a principal for a number of years and I have said and will say over and over again, the most important decision I ever made was who I put in front of that classroom. That was the most important decision that I made. And let me tell you the second part was if I was in a classroom and I was observing -- I've got two girls that I love more than life itself and my trigger for me was would I feel comfortable putting my

daughters in this classroom? And if the answer was no, then I needed to figure out what it was that we needed to put in that classroom to make that teacher even better.

Because that to me is the bottom-line.

My mother -- God rest her soul. She passed in September -- but she used to say to me when I would be talking about a student when I was teacher or as I was a principal and she'd say, "You know, Carey, they are some mother's little darling." And I never forgot that because that was so true. They were some mother's little darling. And that's what I feel when parents are entrusting their children to us. It is a trust. They are giving you the very best they've got and they want you to do the very best that you can with them. So it's incumbent upon me as the chief academic officer, or Maria in her system, to ensure that we are providing the very best that we can provide. And so that's really how we're coming at it, is to improve the craft of our teachers. And that's why we've put the many things that you see in place on that document for literacy. The same circle holds true from any content you want to teach, whether it's science or social studies or whatever. And then the other wheel will change obviously depending on what the content is that we teach.

MS. WINTHROP: Great. Thanks. Thanks so much, Carey.

Michael, let's turn to you now for all of you, you can see him on the screen but we've got him sitting right in front of us. So we have our own private little TV viewing.

So, clearly your work has been referenced in the discussions here but you've looked at these issues about policy to practice. You always tell me getting the right policy is one percent. I don't know what percent of the effort and the rest is about implementation. So why don't you tell us what you think.

MR. BARBER: Okay, thank you. Well, first of all, thank you for the opportunity, Rebecca, and I think what we're seeing maybe actually live as we speak is the globalization of education reform just as an observation. A couple of weeks ago there was a new OECD report that showed that the quality of your education system was more important to the future of your economy than raw materials or possession of oil or other raw materials. So education is fundamental. And what you see and the parallels between Buenos Aires and Washington but also many other cities that you see around the world, the parallels are because school reform is globalizing.

And what I thought I'd do exactly picking up the point you made Rebecca is talk about three or four things that are crucial in getting the policy or the strategy right.

So my first point is school reform is globalizing. My second point is that getting the policy right, as you put it, is -- well, I usually say about 10 percent of a challenge. It's difficult but it's only about 10 percent of it. The 90 percent is the implementation which is what both Maria and Carey have been talking about very eloquently.

Just one other thing before I got into the content of that. I think one of the things I always dreamt that somebody would do and maybe Brookings is the place to do this is that you'd get 10 or 12 cities, great cities around the world in one study and have their strategies. So Buenos Aires and Washington could be two of them but here in London it's been a very successful strategy over the last 10 years. You could include Singapore, you could include somewhere in China, you could include Sydney and Australia, I don't know. But I think comparing big city strategies for translation across continents would be a really great thing to do.

But on the 10 percent getting the strategy right I think actually what we've heard from both Maria and Carey fits very well with what you would say might be global best practice. If I summarize it -- and I'm going to do it very briefly because of the time we've got -- in a system that's got to improve or succeed you need clear standards and expectations, and both speakers spoke about that. In the case of Carey taking about the common core and preparing teachers to deliver the common core; in the case of Maria talking about how she took over a system where there were no expectations of teachers and setting new expectations.

And the second point related to that is having good data and accountability, and again, both systems have referred to that. Maria said assessment is the key to improvement. Unless you know how our system is improving -- performing, you've still got to know what you're supposed to do to improve it, until you know how it's performing and the variations, it's very hard to know where to address your time and attention. So that's kind of the first broad area of strategy, standards, expectations, data, and accountability. And then the second, again which both speakers focused on is improving the quality of teachers. The people you're getting into the profession but above all what they do once they're in the profession. And there was a big focus on both cases, especially in Carey's case on the professional development design to improve instruction both on the content where that's required and pedagogy.

And one of the things that Harry brought out very well is the growing evidence that it's not just about each individual teacher improving him or herself; it's about building the collective capacity of the teachers in a subject area across a school and indeed across a system. And for example, the Summer Leadership Institute would be a good example of getting a kind of collective capacity-building occasion where people

can compare notes, can learn from each other, learn what's happening in other schools, and build teams. And also in this area and also represented by that is the folks on the quality of school leadership which is second only to the quality of classroom teacher and driving outcomes according to the global data.

And then the final thing I want to say about the policy before I come to the delivery is the focus that we heard particularly from Maria about improving the delivery chain as I would call it in the books that Maria referenced. So what is the connection between the people sitting in a central office and the people actually doing the work in a classroom? Very many systems, you meet system leaders who talk about school reform. And if you're going to ask a teacher what's happening they have no idea and the links between the teacher doing that job in the classroom and the centralist system are very weak. So strengthening the delivery chain, making sure there are competent people in each level of the delivery chain and that they know what the mission is is pretty important.

Interestingly, both speakers talked about technology as part of this but not technology leading the strategy but technology as an enabler of the strategy as I just described. So I thought it was very actually exciting to hear both accounts because both seem to me on the basis of what I heard to accord with what you'd say was broadly the right things to do to improve education systems such as Buenos Aires and Washington.

And then if I come to the 90 percent, the implementation of delivery, you can hear from the way both my fellow panelists are talking about their commitment and passion and determination to drive this through, but what does good delivery look like? Maria kindly commented on both of my books. If I tried to summarize both those books in five minutes, this is what it would be. The first is you have to be really clear what you're

trying to do. So the question one you ask is what are we trying to do? And that's about priorities. It was very clear in both cases what the priorities are. And then specify not just what the priorities are but what success would look like. How would you know if you'd succeeded? You meet many, many education systems around the world where people talk generally about wanting to improve the system but they're not clear how they would measure it when they're trying to achieve that goal, what specifically they would use as a means of measuring progress.

So question one, what are we trying to do is about being clear about the priorities and then being clear about the goals. What are you trying to achieve by when? Or to put the question a different way, what would success look like? How would you know if you'd succeeded? And getting that focus right and the answers to that questions seems to me fundamental, not just in improving education systems but improving large systems generally.

And then question two in the two books is how are you planning to do that? I meet leaders of education systems and other big public systems around the world all the time. Some of them are clear about their priorities and their goals but very often there's nothing approaching a plan for achieving the goal. So unless you've got some kind of plan it's unlikely to get delivered. And what you do find in public systems are white papers or pieces of legislation or beautiful, well-written essays but you rarely find some messy real day-to-day plans that say here are the actions, here's the deadlines that are achieving them, here's who's responsible, and this is how we're checking that they get done, and here's the resources to make them happen and here are the risks.

So that process of taking the priorities and goals and then having a plan sounds like a statement of the obvious but very often doesn't happen. So the question

two then is how are you trying to do it? So question one, what are you trying to do? Question two, how are you trying to do it? And then question three is how will you know at any given moment whether you're on track? Maria's point about until you start assessing the system you can't really know whether you're on track or not is absolutely vital here. And one of the things that I did in the Blair administration and I now see others doing in successful change programs is building the routines that drive progress. The periodic check-ins, whether it's once a month, once every two months, whatever it is, where progress is reviewed. Very often, and anybody who's been in the Washington, D.C. school system knows this very well, very often systems are driven by a series of crises, events, controversies, and all of that. But unless you build in the routines that are tracking the data, checking whether the plan is being implemented and then deciding what to do when things aren't on track, you're highly unlikely to deliver. So question three then is how will you know at any given moment whether you're on track? So you need good data systems and need good routines to check progress.

And then question four is if you're not on track, what are you going to do about it? And here again I thought Carey's point about this is not about a gotcha system; it's about creating a system where problems are identified and problems are solved. One of the problems in political systems is when something goes wrong normally the first question people answer is who's to blame rather than what should be the first question, which is what are we going to do to solve the problem. We can allocate the blame. Very often political systems leap into the who's to blame question and that gets in the way of solving the problem because if you're somewhere in a big system and our program isn't going very well, if you know the first question somebody is going to ask is who's to blame, you're probably not going to tell anything -- tell anybody when something's going wrong.

But you know if the first question they can answer is how can we help you solve that problem, you're much more likely to have a conversation. So creating the culture where the first question you answer when something's not on track is how do we solve the problem rather than who are we going to blame is very, very fundamental to delivering success.

And after all in big programs, whether it's Washington, D.C., Buenos Aires, or London, or anywhere else in the world, of course you're going to get some things. Some things aren't going to work. There are going to be crises from nowhere. There will be problems. So unless you can get that process of building the routines and then solving the problems as they arise, it's very hard to deliver the kind of aspirations that my fellow panelists spoke about.

So in conclusion, listening to the two speakers prior to me I thought they were giving very passionate committed accounts that are broadly speaking built on what I understand to be the right elements of strategy with the right kind of focus on getting the job done. And it's been a privilege to work with them.

MS. WINTHROP: Thank you. Thank you, Michael.

We have a good half hour now. So I think what we should do is open it up to questions. I think, yes, let's do that. I think there is possibly a mike roving around, though I don't see one at the moment. So there. There comes the mike from the side. Okay, let's take -- we'll take a couple at a time. So one, two, and I think there's a question there. Yeah, at the back. So right here. Great.

MS. KLEIN: Hi, Andrea Klein. I'm a development specialist with several nonprofits working with the schools. Could you speak to the relationship and how nonprofits could help in supplementing the programs? And secondly, what is the



conversation that you're having with policymakers with regard to the economic needs, especially with businesses?

MS. WINTHROP: Great. Up here.

MS. WERTHEIM: I'm Mitzi Wertheim. I'm with the Naval Post-graduate School. But I have a confession, which is John Dewey, the educational philosopher, was my godfather.

So my first question is since you are designing a system to teach to the test, how do you develop curiosity? How do you allow kids to ask questions? And since a third of our students -- I mean, a third of our teachers as I understand or -- or no, the teachers come from a third -- the bottom third of the college graduating class. And my guess would be they feel insecure if they're asked a question they don't know, and it seems to me the answer is an easy one. Gee, that's an interesting question. Do any of you have an idea how to do it? And if not, how should we go about finding the idea rather than trying to squash down questions?

Anyway, and I guess I look at this from a different standpoint. I think the real issue is learning and not teaching. And I think the language needs to be changed. So I could ask lots more.

MS. WINTHROP: And we had one back here.

SPEAKER: I am a guest scholar with the Brookings Institution. My question was what has been the role of parents in the educational reform? And what are your strategies for improving parent participation, especially those parents from poor economic backgrounds?

MS. WINTHROP: Okay. Just to recap we'll take those three. The first question was about how can nonprofits help supplement the reform efforts? The second

question -- there was a couple but one really about sort of cultivating curiosity. And then a question about should we shift the discourse away from teaching to just learning. And then the third question about parental involvement. So anybody can -- whoever has something to say.

MS. MIGUEL: The first question was, sorry.

MS. WINTHROP: Yeah, why don't you take the first question?

MS. WRIGHT: We have a lot of actually different nonprofits that work with our schools, particularly in our afterschool programming which we are so thankful for because I think they've been able to supplement a lot of the programming needs that we have in our afterschool program. We've got a lot of people that are constantly coming to us, asking how they can be involved. And for us we want to make sure that that involvement links to the strategy.

It's interesting being in the District of Columbia having been in different systems. You get a lot of people coming, wanting to get involved but sometimes they want to come and get involved from their perspective and not necessarily from the school system's perspective. And so we want to make sure that that match is there but we use a lot of our nonprofits to be quite honest with you in our schools on an ongoing basis. Community-based organizations, gosh, we've got a litany of them that are involved really in our schools right now. And we're always welcoming to them because I think that's a huge resource, particularly in a school system like the District of Columbia where there are some of these people that are willing to help but we do use those folks on a regular basis. I don't know how you're using nonprofits.

MS. MIGUEL: I would like to -- the first question, it was very difficult for us. No one wanted to work with us when we started saying that we were going to assess

and evaluate. So we really had a great working site, the Ministry of Education, trying to develop very clear papers of what are we doing, what we're doing. And then now this year, of course, we are opening a huge consultation with universities and third sector or many social different organizations who want to sit on the table and help us to develop what we are doing. But it's a great point what Carey is saying. Many people, it's a great challenge to lead the conversation and the debate in order to not lose the point.

And I would like to answer or talk about the two other questions. The role of the parents. We have created in the Ministry of Education direction or a secretary which's main objective is to develop relationship with community. Parents are very important for us and in the region Brazil is doing a great job with community, Rio de Janeiro and Sao Pablo. They really have developed a very interesting information on the news, on the TV. They give out to every single parent what the learning objectives are. And I saw that at Montgomery County, too, and we are implementing that in Buenos Aires CT. As we are creating the learning objectives we are going to do like a magazine for parents to share with them what are those objectives that the students must learn during the year. We are opening schools on Saturdays for parents and families to come to school and we are taking different courses. And we have technology, a digital plan where we are working very near the teachers. We are also providing parents with courses during the weekends. So we really believe that ever reform or every policy that you take along must come with parents involved. If parents understand what the educational process is and where you are wanting to achieve they will help you a lot and they will help their kids.

I find very interesting what you have said, Mitzi, about changing the conversation from teaching to learning. That is why I said we are not talking about

standards. We really don't want to work over standardized tests or standardized teaching or standardized learning. I think that is a great challenge. We are talking about learning effectiveness but not that much about teaching effectiveness. Although it's very important and we would really love to do it, in my city we cannot talk about it in those terms. So we are talking about improving students' knowledge, improving students' experience of learning. And while we are doing that we are going to start improving and talking about teaching. And of course, we think about teamwork. The whole school as a team -- principals, superintendents, supervisors, teachers, community parents or tutors. Many of our students don't have parents because they come from other countries from the region -- Bolivia, Peru. And they come alone. So it's very important for us to think of the educational process as team work where every single person or actor has an important role. But if we talk about learning we are also talking about teaching. Students cannot learn deeply if we don't have a good teacher doing her job. But it's our responsibility. It's the state's responsibility. That is what we see. If we are assessing that what we see in the results, those results. We have them all online and you can have access to them. Those results are our responsibility. How are we going to change those results? How are we going to improve students' learning by changing and improving and working very closely with teachers, principals, and community? That is what we think.

MS. WINTHROP: Great. Thanks, Maria.

Michael, do you have any thoughts on those three questions you want to add?

MR. BARBER: Yes, quite quickly. So I agree completely with Maria on the parents question so I won't add to that, the quality of inflation to parents and their ability to use that information is vital.

On the point referencing John Dewey, my thought on that is I often cited the road to hell in education is paved with false dichotomies and we really need to avoid falling into the trap of saying learning, not teaching or teaching, not learning. Actually, both are going to be pretty important. Clearly you can learn things without teachers but across school systems, if you get the right quality of teachers with the teachers learning the right things that will generate the quality of learning. So I'd really avoid the false dichotomy of that. The learning outcomes are what we want but teachers are a key part of delivering that for large systems certainly in the foreseeable future.

And then similarly, there's another false dichotomy of setting up a false dichotomy of curiosity versus learning to read and write well or learning to do basic mathematics. The things go together. Children who learn to read a vast array of text are much more likely to be curious than those who don't. So we need to avoid a false dichotomy there.

And then on the nonprofits, I think if I had two specific sentences to answer that question, one is the experimentation of being able to take risks is quite hard for public authorities to take risks in the current era. Money is in short supply. The media is demanding and the job is tough enough anyway. So nonprofits can take risks, can experiment, and they can also create a culture of expectations.

Rebecca, I know you've been in Pakistan. I was talking to somebody in the southern part of Punjab about how they could strengthen the enrollment drive that actually starts today in Punjab and they said the three key people to get kids into school in the southern rural part of Punjab are the Iman, because everybody goes to the mosque; the barber, who speaks to the men while trimming their beards; and the district nurse who speaks to women because she can go into their homes. That's the kind of

thing nonprofits can do to create a kind of culture of expectation. So my answer to that question would be one, experiment and take risks; and two, create a culture of expectations.

MS. WINTHROP: Great, thanks. I see many more questions. Let's go this way. So one, two, three, four. So all the way at the end here. The beautiful sort of pink blouse.

SPEAKER: Hi. I had a question specifically about Buenos Aires. Looking at your first table, it appears half the students go to a private school. And so I'm wondering whether your schools are set up like ours where you have a public system and then you have parents who choose a privately organized school and why it appears there's an equal number of students in the private system compared to the public system? And how do you work together?

MS. WINTHROP: Great, thanks. Then we had one right there. Yeah.

MR. ALTMAN: Hi, I'm Fred Altman. And I have a double question.

One is in the D.C. area or in the others, too, is this now being accepted by the teachers and the teachers' unions? There has been classically a lot of resistance and it was in the paper again about resistance to reforms. And the other one is there's a paper from a person at Brookings, Russ Whitehurst, being skeptical about the common core standards. Any reaction to the skepticism?

MS. WINTHROP: Great. And then we had --

MS. CHRISTIANSEN: Thank you. Jill Christiansen from the National Education Association.

That concept of partnership in order to bring about the very best student achievement is so important. So whether it is following with Michael's thoughts on

blaming compared to them working together or how it's done, I guess what I would really like to hear is, in fact, with the education union, since they are the representatives of the teachers, OECD has stated that progress with student achievement cannot happen without the teachers and the partnership. So to hear about what efforts have been made in the partnership in process, which also then in my mind goes for partnership with parents, hearing from them in addition to telling to them. Thanks.

MS. WINTHROP: And I think we probably have -- was there another question roaming around here? Right here. The gentleman. Right here with the fashionable bowtie.

MR. FLEMING: Oscar Fleming with Child Fund International. A big focus of our work is bringing the children and youth into the programming not as recipients but as active programmers with us. So I'd be interested to hear how children and youth, the students have been involved in the work that you've done or where you see them coming in and how.

MS. WINTHROP: Okay, great. I think we have sort of three-ish questions. There's one, a question about particularly for you, Maria, about private and public. And then we had some questions particularly for you, Carey, about the common core standards. I think a question for everybody, all three of you around teacher unions and partnership and partnership with teachers. And then the last one is around child and youth participation.

MS. MIGUEL: Child?

MS. WINTHROP: Child and youth participation. So how are students participating in the reforms?

Michael, why don't we start -- we'll go in reverse now. Why don't we

start with you and then we'll have Maria and Carey comment.

MR. BARBER: All right, thank you. And I'm not sure it was aimed at me but on the common core I think it's the biggest opportunity for the U.S. to make progress in education for a generation and I really hope that in the way Carey described it that the opportunity will be seized. I think it's a massive opportunity over the next two or three years. And if the U.S. gets it right I can see the U.S. becoming once again a global leader on education. So I think it's that important.

The common core is a great opportunity for the U.S. That was my first point. On the union strategy I think there's -- like all these relationships, it depends on both parties. So clearly governments generally around the world are in a hurry. On the whole they find unions holding them back and wanting to slow things down and that leads to frustration. They definitely need to be in dialogue with the unions. They definitely need, as beautifully exemplified, for example, in the Ontario School Reform, a kind of relationship where the government pushes ahead but does it through dialogue.

But then I also think union leaderships need to rethink that position. And to me a traditional union position basically summarized ruthlessly says pay us some more money and we might improve the system. Whereas I think the union leadership position should be the exact reverse. We're going to improve the system; then you'll see it's worth investing in. I think if more unions took that position, the stronger the dialogue between governments and unions would be.

And on children and youth participation there's a growing amount of evidence that -- and John Hattie's work would be an example. John Hattie from the University of Melbourne about how important it is to improvement of performance for the



children to be active participants in shaping their own learning, knowing how well they're doing, getting good feedback. And so the more you can make the child an active participant in their learning rather than simply a recipient of teaching, so much the better.

MS. WINTHROP: Carey. Thoughts from you.

MS. WRIGHT: Yeah, absolutely. So I absolutely concur with Michael's point about the Common Core State Standards. One of the criticisms that we received in the District was from parents saying that they felt that the quality of the education depended on the ward that they lived in. And so for me I thought this was a great opportunity to ensure that every single child, regardless of where they lived in what ward, were going to be getting a strong content background based on the Common Core State Standards and based on the scope and sequence documents and the units that we put together, et cetera, et cetera.

So for me it was leveling the playing field and it was an opportunity, regardless of whether children moved from one ward to the other during the year, they weren't going to miss a beat because typically within a given period of time, it wasn't a day-to-day kind of sequence but within a few days everybody was kind of focusing on the same kind of content. So I absolutely believe that this has the opportunity to be a game changer for the District of Columbia because of the quality of the standards themselves and also we've been working very closely with both David Coleman from the English language arts part of it and Jason Zimba from mathematics. So we feel very good about the work that we're doing where that is concerned.

I also think about students and getting youth involved, our chancellor has a youth cabinet that she meets with on a regular basis as she does a teacher cabinet and as she does a principals cabinet. And so I think this gives her an opportunity to meet

face-to-face with the people that are impacted by the academic plan and the reform that we're doing.

I attended principal cabinet meetings on a regular basis and it's great to hear their feedback of what their meeting success with and what they're not. The children are not shy about saying what it is that's going well for them and what's not. So I think this is -- having a student voice is critical at all times.

I also think that to your point about the teachers' union, it is a partnership. I mean, it is truly a partnership. I'm fortunate enough that I meet with the executive board of our teacher's union every other week. And it is really looked at as a mutual way of exchanging information, problem solving where it need be. They're kept apprised all the time of what we're planning in terms of our professional development. They're welcome to attend obviously. I had a meeting with many of the reps. I guess it was not last year but the year before who had questions and concerns about some things, so you've got to be willing to listen. And that doesn't always necessarily mean that all the answers are going to land one direction or the other but to me I think once you establish a partnership and a relationship with people then there's not anything that you really can't solve or work your way through. I do not believe in an adversarial approach whatsoever. It doesn't get you anywhere regardless of whose side of the table you're sitting on. It's us. It's not us and them. It's us as a group. So I feel very strongly about that. And have always, regardless of what system I've worked in tried to establish that kind of relationship with the teachers.

And I think that one thing I didn't get a chance to say and that was to your point about parents. Parents are an absolutely critical partner and they are their child's first advocate. As I've said to people many times over, nobody loves my

daughters more than I do and nobody can be their advocate more than I can be. But I think that we've also got to figure out a way to meet parents where their comfortable meeting us, too. When we held our state of the union, if you will, state of the ward meetings around the district we provided interpreters for each of those meetings so that parents could feel comfortable and being heard about what their concerns were. Some parents, it's tough for them to come to school. So how is it that we can involve them at home to where they're comfortable doing that as well?

So we're open in exploring all kinds of ideas about that but nobody can accomplish anything by themselves. We can't as educators. Parents can't by themselves. And children can't by themselves. So for us it's how do we all come together and make this work and make this work for the betterment of children?

MS. MIGUEL: Well, I will first ask you a question. It's a very good question because Buenos Aires City in my country we have a federalized system. We are 24 provinces or states where the educational -- it's a public-private system. A public state system. In most of the country, the other provinces have 70 percent of public state schools and 30 percent of public-private schools. In Buenos Aires City we are a case in the region. Fifty and 50. Fifty percent of our students attend public-private schools and 50 percent attend public-private schools. What we do as the Ministry of Education, we pay the salaries for the private schools. From the 10 percent of the private schools, 70 percent of those schools receive subsidiaries -- subsidiaries is okay the word?

MS. WINTHROP: Mm-hmm.

MS. MIGUEL: But it can be only used to pay salaries. It's not used for any other thing. This is a huge demand from the teacher unions who are always saying that we are giving more money for private schools than for public schools. But the thing

is that you will find from that 70 percent of public-private schools, like 50 percent or 45 percent as schools where parents are paying something like \$40 a month. Those are Catholic schools. And those students are coming maybe from very low income areas, social backgrounds, whose parents are doing a great effort to send them to those schools.

So for the very first time the last two years, we also gave what those social policies that we are doing for public-private state schools, we took them to those schools. Students from attending private schools are receiving books and netbooks. And this was a huge discussion. But what we say is we are looking to the student. And that student may be the same student that is attending a public state school.

So it is a huge challenge for us when you are planning policies to think of both systems. For many years there has been a huge separation from one to another. Now we are working really hard when we are, for example, now we are planning the reforming secondary school content curriculum. We are doing the curriculum from scratch again to attain the 21<sup>st</sup> century skills needed. And we are sitting on the table with private schools, professionals, or teachers. And this has never ever happened. So we are working. I hope to really leave like a kind of work, a new model of producing educational policies in Buenos Aires City because it's very important.

About unions, in Buenos Aires City we have 17 unions. Most of the provinces have only one or two and we have 17. And every year because there is a national law, teacher unions must sit down with the Minister of Education and they negotiate salaries for all the year. We do this with 17 people sitting on the table and what we have done, the Minister Esteban Bullrich has a team who is only dedicated to attend to unions' demands and questions and problems and whatever, and they sit every single

month with the Minister of Education, with an agenda, and they work. And when he has negotiated salaries, in that agenda you are going to see that they have discussed about teacher evaluations. They have discussed about assessments. And this year, for example, we have five compulsory days of training for every single teacher. And those things are talked with unions. I do agree a million percent with what you said. It's not them and us. It's us. They are teachers. We have unions giving lessons to our students, so they are us. They are part of this.

So we really think that we must have lots of conversation. We really have a very humble position in this. They have been in the system for 35, 40 years. So we must listen to what they have to say. And we really try to work with them. And they know that when you need to -- when you get to know them and to meet with they think and to understand what they think, you can have better conversations. So partnership is very important.

And about students' participation, we've done a survey for all secondary school students. We have 17,000 students participating. It's an online survey. If you speak or read Spanish it is called Piense en Grande, "Think Big." We help them to decide what they want to study. We provide them with information of every university of high school they have. If they don't know what to study we help them to decide with professionals. Not we, the Ministry, professionals. And there we have asked them what would they do to reform secondary school? Which is what we are doing right now. And it's just really interesting because they walked very deeply about how teachers should improve. They said that they know they're not getting the best teachers they should have. They said that they don't feel prepared to attend university and they are leaving school. So that survey for us was a survey -- that's okay pronounced?

MS. WINTHROP: Survey, yes.

MS. MIGUEL: It is very important for us. They are participating. We started with 200 students and now we have 17,000. So and every single assessment that we do to every student, it has social questions. Another survey where we ask students about their social backgrounds. And in the last year assessment where we had this 26,000 students participating we made for the very first time focus groups where students, teachers, and principals, different groups, and they have been asked about their experience. Students have been asked about their experience through school. And that was really, really interesting.

We have all these papers or information. We've done papers for every assessment and they are online. So if you need translation -- they are in Spanish -- but it was really interesting to listen to what is going on on the students' life and experience.

MS. WINTHROP: Great. Thank you. I think we're just about out of time. So in closing I just want to say thanks to all three of you. Thank you, Maria, for spending time with us on your visit here to the states. What you guys don't know is she spontaneously ran the Cherry Blossom 10-mile race yesterday. (Laughter)

(Applause)

MR. BARBER: Yeah, bravo. Bravo. Yeah.

MS. WINTHROP: It's not all education meetings. She's clearly a go-getter. Yeah, that exhausts me just the thought.

Thank you also, Carey, for taking time out. And Michael, thank you for convincing us that we could video conference and be modern. Thanks everybody.

(Applause)

\* \* \* \* \*

ANDERSON COURT REPORTING  
706 Duke Street, Suite 100  
Alexandria, VA 22314  
Phone (703) 519-7180 Fax (703) 519-7190

## CERTIFICATE OF NOTARY PUBLIC

I, Carleton J. Anderson, III do hereby certify that the forgoing electronic file when originally transmitted was reduced to text at my direction; that said transcript is a true record of the proceedings therein referenced; that I am neither counsel for, related to, nor employed by any of the parties to the action in which these proceedings were taken; and, furthermore, that I am neither a relative or employee of any attorney or counsel employed by the parties hereto, nor financially or otherwise interested in the outcome of this action.

/s/Carleton J. Anderson, III

Notary Public in and for the Commonwealth of Virginia

Commission No. 351998

Expires: November 30, 2012

ANDERSON COURT REPORTING  
706 Duke Street, Suite 100  
Alexandria, VA 22314  
Phone (703) 519-7180 Fax (703) 519-7190