

SPEAKING NOTES FOR SHARYN GRAVELLE
VICE-PRESIDENT, WIRELESS, TORONTO HYDRO TELECOM
WIRELESS CITIES SUMMIT
TORONTO, JANUARY 24, 2007

CHECK AGAINST DELIVERY

[SLIDE OF ONE ZONE, NO STRINGS ATTACHED COLLATERAL]

GOOD MORNING. IT'S A PLEASURE TO BE HERE WITH YOU TODAY ...
AND TO SHARE WITH YOU MY EXPERIENCE AS ONE OF THE ARCHITECTS
RESPONSIBLE FOR THE INSTALLATION OF TORONTO HYDRO TELECOM'S
NEW ONE ZONE WIFI NETWORK.

I MUST CLARIFY UP FRONT THAT THE WORDING IN THE CONFERENCE
BROCHURE FOR MY DISCUSSION WITH YOU THIS MORNING IS A LITTLE
MISLEADING – NO REFLECTION ON THE CONFERENCE ORGANIZERS
WHO I BELIEVE HAVE DONE A TERRIFIC JOB. AT THE TIME THAT THE
BROCHURE WAS PREPARED, OUR FOCUS WAS ON NETWORK
DEPLOYMENT, AS OPPOSED TO SPEECH-WRITING. AT ANY RATE, I'LL
PROVIDE CLARIFICATION ON THIS AS I PROCEED.

I AM CERTAINLY HONOURED TO BE SHARING THE PODIUM WITH SO
MANY EXPERTS FROM AROUND THE WORLD INCLUDING
REPRESENTATIVES FROM FREDERICTON – HOME OF MY ALMA MATER.

I AM ALSO REALLY PROUD THAT COLLECTIVELY -- AND WITHIN A RELATIVELY SHORT PERIOD OF TIME -- WE AS AN INDUSTRY HAVE SUCCEEDED IN BRINGING WIFI TECHNOLOGY INTO THE PUBLIC IMAGINATION...INTO THE MEDIA SPOTLIGHT...AND ONTO THE WORLD STAGE. WOW, WHAT A DIFFERENCE A FEW YEARS CAN MAKE, DON'T YOU THINK?

I'D LIKE TO THANK OUR CONFERENCE ORGANIZERS FOR CALLING THIS MEETING A 'SUMMIT' BECAUSE IT IMPLIES THAT WE'RE ALL HERE TO LEARN FROM EACH OTHER.

BETWEEN YESTERDAY AND TODAY, I CERTAINLY HAVE LEARNED A GREAT DEAL ABOUT MUNICIPAL WIFI. IT HAS MADE GETTING ON A PLANE AND GOING TO LOOK AT NEW DEPLOYMENTS FIRST-HAND A BIT REDUNDANT ...ALTHOUGH IN THE MIDDLE OF A CANADIAN WINTER, I CAN'T SAY I WOULD BE VERY DISAPPOINTED TO VISIT ITALY OR TAIPEI.

EVEN BEFORE WE LAUNCHED ONE ZONE, WE LOOKED AT DIFFERENT BUSINESS MODELS TO SEE WHAT WE COULD LEARN FROM THEM... AND IN THE END, AS YOU MAY KNOW, TORONTO HYDRO TELECOM OPTED FOR A SUSTAINABLE, PAY-FOR-SERVICE MODEL.

LET ME SAY RIGHT OFF THE TOP THAT OUR VIEW IS THAT METRO BROADBAND NETWORKS SHOULD NOT BE, IN FACT CANNOT BE, FREE ... NOR DO WE THINK THEY SHOULD BE FUNDED THROUGH TAXES.

I'VE HEARD IT STATED THAT WIFI ACCESS TO THE INTERNET SHOULD BE AS 'FREE' AS ACCESS TO ROADS BUT I HAVE TO STOP AND WONDER IF THOSE PROPONENTS HAVE EVER TAKEN HIGHWAY 407 – THE TOLL ROAD NORTH OF DOWNTOWN – OR IF THEY HAVE EVER DEPOSITED MONEY INTO A PARKING METER BEFORE LEAVING THEIR CAR PARKED ON SO-CALLED 'FREE' ROADS.

LET'S BE CLEAR. IT IS SIMPLY NOT TRUE TO SAY THAT WIRELESS BROADBAND SHOULD BE OFFERED FREE BY CITIES BECAUSE IT IS AN ESSENTIAL SERVICE LIKE WATER OR ELECTRICITY. CERTAINLY, WE ALL RECEIVE BILLS FOR WATER AND ELECTRICITY, DON'T WE? AND THOSE BILLS ARE BASED ON **CONSUMPTION** AND **USAGE**.

THE ANALOGY BETWEEN FREE WIFI ACCESS AND 'FREE' ESSENTIAL MUNICIPAL SERVICES SIMPLY DOES NOT HOLD WATER. CONSUMPTION COSTS MONEY, THAT'S THE PLAIN AND SIMPLE TRUTH. IN THE WISE WORDS OF MY MOM: 'THERE IS NO SUCH THING AS A FREE LUNCH.' WE **DO** BELIEVE IN PAID SUBSCRIPTIONS ... AND THE REASON IS SIMPLE: OUR VIEW IS THAT IF A PRIVATE COMPANY – WHICH WE ARE --

INVESTS CAPITAL TO BUILD A NETWORK...SPENDS MONEY TO DEVELOP A BACK-OFFICE INFRASTRUCTURE...IMPLEMENTS PASSWORD AUTHENTICATION TOOLS TO KEEP PREDATORS AND OTHER UNSAVORY CHARACTERS OFF ITS NETWORK...SPENDS TIME TO PROMOTE, ADVERTISE AND EDUCATE CONSUMERS ...CONTINUES TO INVEST TO ENSURE QUALITY SERVICE LEVELS...AND LASTLY, WORKS TO CREATE A SUPPORTIVE REGULATORY ENVIRONMENT FOR THE BENEFIT OF THE ENTIRE INDUSTRY – WELL THEN, **THAT** ORGANIZATION SHOULD BE ABLE TO RECOUP ITS INVESTMENT.

WE CAN'T RECOUP OUR INVESTMENT THROUGH TAXES OR RATES BECAUSE TORONTO HYDRO TELECOM IS NOT A BRANCH OF THE CITY OF TORONTO ... NOR ARE WE PART OF THE CITY'S I.T. DEPARTMENT ... AND WE CERTAINLY ARE **NOT** PART OF A PUBLIC PRIVATE PARTNERSHIP, WHICH IS THE POINT OF CLARIFICATION FROM THAT STATED IN THE CONFERENCE BROCHURE.

WHAT WE **ARE** IS A STAND-ALONE, INDEPENDENT AFFILIATE OF TORONTO HYDRO CORPORATION WHOSE SOLE SHAREHOLDER IS THE CITY OF TORONTO. WE'RE A REGISTERED CORPORATION WITH A BOARD OF DIRECTORS ... AND WE HAVE THE SAME FIDUCIARY RESPONSIBILITIES AS ANY OTHER CORPORATION.

A PORTION OF OUR ANNUAL PROFIT IS RETURNED TO TORONTO HYDRO CORPORATION WHICH, IN TURN, MAKES AN ANNUAL DIVIDEND PAYMENT TO THE CITY.

IN THIS REGARD, WE ARE ABSOLUTELY **NO DIFFERENT** FROM OUR COMPETITORS. BECAUSE WE ARE 100% FUNDED THROUGH OPERATIONS, PAID SUBSCRIBERS ARE OUR BREAD AND BUTTER.

IF WE ARE GOING TO COMPETE, THEN WE NEED A HIGH-END, SCALABLE, SUSTAINABLE OFFERING THAT DELIVERS ON PRICE, ON SERVICE AND ON QUALITY ... AND THAT'S **EXACTLY** WHAT ONE ZONE PROVIDES.

I WANTED TO BRING CLARITY TO THIS POINT UP FRONT ... AND RATHER THAN FOCUS ON WHAT MIGHT SET US APART, TODAY I'D LIKE TO TALK ABOUT WHAT CONNECTS US – AND THAT IS A SHARED BELIEF IN THE POWER OF THIS TECHNOLOGY, THE ABILITY TO ENABLE MORE EFFICIENCY IN GOVERNMENT, TO IMPROVE EDUCATION AND HEALTHCARE, THE INNOVATION POTENTIAL OF WIRELESS BROADBAND NETWORKS AND AS A WAY, BY VARIOUS MEANS, TO BRIDGE WHAT SOME HAVE REFERRED TO AS THE DIGITAL DIVIDE.

TO THAT END, MY PRESENTATION THIS MORNING IS IN TWO PARTS. FIRST, I'LL WALK YOU THROUGH THE BASICS OF OUR ONE ZONE NETWORK, INCLUDING THE CHALLENGES WE FACED ON A NUMBER OF FRONTS PRIOR TO DEPLOYMENT ... AND HOW WE DEALT WITH THOSE CHALLENGES. OF COURSE, EVERY DEPLOYMENT IS UNIQUE AND WILL HAVE DIFFERENT CHALLENGES...AND EVERY DEPLOYMENT WILL RISE TO THEIR CHALLENGES WITH DIFFERENT STRATEGIES. I'LL SIMPLY SHARE OURS WITH YOU.

IN THE SECOND PART OF MY PRESENTATION, I'LL ADDRESS SOME OF THE CHALLENGES I SEE AHEAD FOR OUR NETWORK. IT'S IN OUR APPROACH TO **THESE** CHALLENGES THAT I'LL EXPLAIN THE COMMENT I JUST MADE ABOUT TECHNOLOGY AS AN ENABLER.

PART 1:

ELEVEN MONTHS AGO – ON MARCH 6, 2006 – TORONTO HYDRO TELECOM ANNOUNCED ITS INTENTION TO BUILD THE LARGEST WIFI NETWORK OF ITS KIND IN NORTH AMERICA, WITH A COMMITMENT TO UBIQUITOUS, UNFETTERED INTERNET ACCESS.

TEN MONTHS LATER AND RIGHT ON SCHEDULE – ON JANUARY 1ST, 2007 – WE MADE GOOD ON OUR WORD.

[SLIDE OF FIVE PHASES COMPLETED]

TODAY, ONE ZONE IS LOCATED IN FIVE DIFFERENT, CONTIGUOUS SECTIONS OF DOWNTOWN TORONTO, COVERING AN AREA OF SIX SQUARE KILOMETRES, FOR A GRAND TOTAL OF 235 CITY BLOCKS.

THOSE OF YOU WHO KNOW TORONTO KNOW THAT THE AREA THAT'S HIGHLIGHTED ON THIS MAP IS EXTREMELY HIGH-DENSITY... THAT IT INCLUDES THE CITY'S FINANCIAL CORE, THE ENTERTAINMENT DISTRICT, SEVERAL UNIVERSITIES AND COLLEGES, A HANDFUL OF HOSPITALS AND KEY GOVERNMENT OFFICES INCLUDING THE SEAT OF OUR PROVINCIAL GOVERNMENT AND URBAN RESIDENCES.

[PHOTO OF OUTDOOR USERS]

IF CONNECTIVITY AND MOBILITY WERE GOING TO BE ATTRACTIVE TO USERS, **THIS** WAS THE PLACE TO BE. AND **THIS** WAS EXACTLY WHERE WE KNEW WE HAD TO START WITH ONE ZONE.

WHAT MANY PEOPLE DON'T KNOW IS THAT PRIOR TO ONE ZONE'S DEPLOYMENT, THIS AREA WAS ALREADY WIRED UNDERGROUND AS PART OF THE FIBRE OPTIC NETWORK THAT TORONTO HYDRO TELECOM HAS OPERATED SINCE 1998 -- A NETWORK THAT SPANS 450

KILOMETRES ... THAT CONNECTS MORE THAN 400 COMMERCIAL BUILDINGS IN TORONTO ... AND THAT MAINTAINS INTERCONNECTS TO UTILITY-AFFILIATED NETWORKS BORDERING THE GREATER TORONTO AREA.

WITH ONE ZONE, OUR ENGINEERING OBJECTIVE WAS TO CONNECT TORONTO HYDRO TELECOM'S EXISTING FIBRE OPTIC NETWORK UNDERGROUND TO AN ABOVE-GROUND RADIO NETWORK OPERATING ON THE UNLICENSED 802.11 WIFI BAND.

WE DID THIS BY DEPLOYING 225 RADIO ACCESS POINTS USING EQUIPMENT FROM OUR VENDOR OF RECORD – SIEMENS CANADA IN PARTNERSHIP WITH BEL-AIR NETWORKS. WE ATTACHED OUR RADIO EQUIPMENT TO STRATEGICALLY LOCATED STREETLIGHTING POLES...THEN CLOSED THE LOOP WITH 20 FIBRE CONNECTION POINTS AND BACK OFFICE PLATFORMS. AND IT IS A FULLY ENCRYPTED NETWORK.

[PHOTO OF RADIO ACCESS POINT WITH CANADIAN FLAG]

OUR MULTI-RADIO MESH ARCHITECTURE DESIGN RESULTS IN ONE SEAMLESS WIFI ZONE THAT NOT ONLY IS CONTINUOUS BUT IS ALSO TOTALLY SCALABLE.

THE FIRST PHASE OF THE ONE ZONE NETWORK WENT LIVE ON SEPTEMBER 6, 2006 ... WITH A FREE TRIAL PERIOD THAT EXTENDS UNTIL MARCH 7, 2007.

FROM SEPTEMBER TO TODAY, I AM VERY PLEASED TO SAY THAT WE HAVE ISSUED IN EXCESS OF 30,000 AUTHENTICATED PASSWORDS... AND WE ANTICIPATE THAT NUMBER WILL INCREASE TO UPWARDS OF 50,000 BY THE TIME WE START CHARGING CUSTOMERS FOR ACCESS TO ONE ZONE IN EARLY MARCH.

QUITE APART FROM THE ENGINEERING CHALLENGES WE ENCOUNTERED IN SUCH A HIGH DENSITY AREA, THERE WERE OTHER EQUALLY TIME-CONSUMING AND IMPORTANT ISSUES THAT REQUIRED OUR ATTENTION PRIOR TO DEPLOYMENT.

THE FIRST CHALLENGE WAS THAT MANY OF THE STREETLIGHTING POLES WHICH WE PLANNED TO USE TO POWER UP THE NETWORK DID NOT HAVE 24/7 POWER. BEFORE THE NETWORK COULD GO LIVE, WE NEEDED TO WORK WITH TORONTO HYDRO STREETLIGHTING INC. PERSONNEL IN ORDER TO RECTIFY THIS SITUATION.

NOW, THIS MAY HAVE BEEN HUGELY PROBLEMATIC IN OTHER CITIES ... BUT BECAUSE TORONTO HYDRO STREETLIGHTING INC. IS OUR SISTER COMPANY AND BECAUSE IT OWNS THE POLES, WE WERE ABLE TO LEVERAGE THAT RELATIONSHIP AND REMEDY THE SITUATION IN GOOD TIME.

THE SECOND CHALLENGE WAS PUBLIC UNCERTAINTY ABOUT ELECTROMAGNETIC FIELDS – A CONCERN THAT WE TOOK VERY SERIOUSLY. WE PROACTIVELY SAT DOWN WITH OFFICIALS FROM THE CITY OF TORONTO'S DEPARTMENT OF PUBLIC HEALTH / ENVIRONMENTAL PROTECTION OFFICE LAST SPRING AND HERE'S WHAT WE TOLD THEM:

- THAT TORONTO HYDRO IS IN FULL COMPLIANCE WITH FEDERAL GUIDELINES AND REGULATIONS THAT PERTAIN TO RADIO FREQUENCY EMISSIONS AND ELECTROMAGNETIC FIELDS. THESE REGULATIONS INCLUDE HEALTH CANADA SAFETY CODE 6, WHICH PARALLELS INTERNATIONAL STANDARDS, AND INDUSTRY CANADA RSS- 102.

- THAT TORONTO HYDRO TELECOM IS FULLY COMMITTED TO THE CITY OF TORONTO'S PROPOSED PRECAUTIONARY PRINCIPLE ... AND THAT ONE ZONE EXCEEDS TORONTO PUBLIC HEALTH'S RECOMMENDATIONS

FOR 100 TIMES THE DISTANCE FACTOR REQUIRED UNDER HEALTH CANADA'S SAFETY CODE 6.

- WE ALSO REFERRED THEM TO THE MAY 2006 WORLD HEALTH ORGANIZATION FACT SHEET No.304 ON EMFS WHICH STATES, **CATEGORICALLY**, THAT THERE IS NO CONVINCING EVIDENCE THAT THE WEAK RADIO FREQUENCY SIGNALS FROM BASE STATIONS AND WIRELESS NETWORKS CAUSE ADVERSE HEALTH EFFECTS.

- AND LASTLY, WE TOLD THEM THAT THE MANUFACTURER OF OUR ACCESS POINTS – BEL AIR NETWORKS – HAD SIGNED A DECLARATION OF TECHNICAL COMPLIANCE WITH RESPECT TO RF EMISSIONS.

WE PROACTIVELY SENT AN OFFICIAL LETTER EXPLAINING OUR STATUS ON COMPLIANCE TO THE MEDICAL OFFICER OF HEALTH LAST JUNE...AND ARE PLEASED TO SAY THAT THE TORONTO BOARD OF HEALTH IS COMPLETELY SATISFIED WITH OUR COMPLIANCE.

THE THIRD ISSUE WAS THAT OF AUTHENTICATION. AS I SAID IN RELATION TO EMFS, WE TAKE PUBLIC CONCERNS ABOUT SAFETY VERY SERIOUSLY ... WHEN INQUIRIES WERE MADE TO US FROM CITY POLICE DEPARTMENTS AS TO WHAT TYPE OF AUTHENTICATION PROCESS WOULD BE USED DURING OUR FREE TRIAL TO DETER PREDATORS AND

OTHER NEFARIOUS INDIVIDUALS, WE TOOK THE TIME TO REVIEW THE VARIOUS OPTIONS AND IMPLEMENT THIS CRITICAL SAFETY NET FOR OUR USERS.

SO WHERE ARE WE NOW...NOW THAT THE NETWORK IS UP AND RUNNING...NOW THAT SOME 900 CONCURRENT USERS ARE CONNECTED TO ONE ZONE DURING OUR HIGH PEAK TIME...NOW THAT WE KNOW WHAT USERS WANT TO BE CAPABLE OF DOING ON-LINE...AND NOW THAT WE CAN OPTIMIZE THE NETWORK TO MEET THEIR REQUIREMENTS?

OUR FOCUS NOW IS ON ENSURING ONE ZONE BECOMES A SUSTAINABLE SERVICE OFFERING. THAT MEANS COMPLETING OUR NETWORK RADIO OPTIMIZATION ACTIVITIES AND FINALIZING THE BACK-OFFICE INFRASTRUCTURE FOR ENHANCED AUTHENTICATION AND FOR BILLING. IT MEANS MARKETING, PUBLIC EDUCATION, AND PROMOTION. AND IT MEANS HAVING THE SYSTEMS IN PLACE TO PROVIDE EXCELLENT CUSTOMER SERVICE.

ESSENTIALLY, WHAT IT ALL BOILS DOWN TO AT THIS POINT IS BEING ABSOLUTELY CERTAIN THAT WE CAN LIVE UP TO CONSUMERS' EXPECTATIONS FOR A HIGH-END SERVICE AT THE RIGHT PRICE

POINT...AND THAT WE CAN MEET THOSE EXPECTATIONS OVER THE LONG-TERM.

NOW BEFORE I MOVE ON TO THE SECOND PART OF MY PRESENTATION, I WOULD LIKE TO SHARE WITH YOU SOME GOOD NEWS THAT I RECEIVED LATE LAST WEEK...AND THAT SOME OF YOU MAY ALREADY HAVE READ ABOUT IN THE NEWSPAPER.

IN AN INDEPENDENT THIRD PARTY ANALYSIS OF 41 DISTINCT WIRELESS NETWORKS IN 14 CITIES IN CANADA AND THE UNITED STATES, CONDUCTED BY ANALYSTS AT NOVARUM, TORONTO HYDRO TELECOM'S ONE ZONE NETWORK SCORED NUMBER 1 IN SYSTEM PERFORMANCE.

ACCORDING TO ANALYSTS KEN BIBA AND PHIL BELANGER, ONE ZONE OFFERED "STUNNING PERFORMANCE, BETTER THAN MY HOME BROADBAND" ... "THAT IN MANY LOCATIONS, ONE ZONE PROVIDED BIDIRECTIONAL SPEEDS OF 5 MBPS" ... AND THAT ONE ZONE WAS SETTING THE GOLD STANDARD FOR METRO WIFI NETWORKS WITH THE DENSITY OF ITS NODES PER SQUARE KILOMETRE."

I HAVE TO TELL YOU IT'S EXTREMELY GRATIFYING TO HAVE OUR WORK VALIDATED BY AN INDEPENDENT THIRD PARTY...ESPECIALLY BECAUSE THIS IS EXACTLY WHAT OUR SMALL TEAM ENVISIONED WHEN WE

ENGINEERED ONE ZONE IN THE FIRST PLACE. AND TESTING WAS DONE WHILE WE WERE STILL DEPLOYING THE NETWORK!

ONE ZONE ALSO PLACED WITHIN THE TOP TEN FOR SERVICE AVAILABILITY...AND WHILE WE KNEW THE AUTHENTICATION PROCESS MIGHT SLOW US DOWN DURING THE FREE TRIAL PERIOD, WE'RE OPTIMISTIC THAT AS WE MOVE BEYOND MARCH 7, THESE LEVELS WILL IMPROVE.

PART 2:

[PHOTO OF THE CN TOWER AND CITY OF TORONTO]

I'D LIKE TO TALK NOW ABOUT THE FUTURE ...AND WHAT I SEE DOWN THE ROAD FOR ONE ZONE.

MANY PEOPLE ASK ME, "OK, NOW THAT YOU'VE DONE DOWNTOWN TORONTO, WHEN ARE YOU GOING TO MAKE THE REST OF TORONTO PART OF THE ONE ZONE NETWORK?"

HERE'S WHAT I SAY: BEFORE AMALGAMATION, THE OLD CITY OF TORONTO WAS APPROXIMATELY 97 SQUARE KILOMETRES IN SIZE. POST AMALGAMATION, THE NEW CITY OF TORONTO COVERS MORE THAN 630 SQUARE KILOMETRES.

BEFORE WE COULD EVEN CONTEMPLATE A DEPLOYMENT ON SUCH A MASSIVE SCALE, WE OWE IT TO OUR CUSTOMERS TO BE 100% CERTAIN THAT WE STILL WILL BE ABLE TO PROVIDE A HIGH-END SERVICE...**AND** WE OWE IT TO OUR SHAREHOLDER TO BE EQUALLY CERTAIN WE CAN PROVIDE A CONSISTENT AND SUSTAINABLE REVENUE STREAM WITH STEADY PROFITS.

ONLY WHEN **THAT** HAPPENS CAN WE THINK OF GOING TO THE NEXT LEVEL. IF THE ENTIRE CITY OF TORONTO IS GOING TO BE WIRED – BOTH TO FUEL THE ECONOMIC FORTUNES OF CANADA'S LARGEST CITY ... BUT ALSO TO ENABLE MORE EFFICIENCIES FOR ITS MUNICIPAL INFRASTRUCTURE IN AREAS SUCH AS TRANSIT, HEALTH CARE, EDUCATION – THEN I WOULD PROPOSE THAT MAJOR CHANGES NEED TO OCCUR IN THE AREA OF REGULATION.

WHAT DO I MEAN EXACTLY? I MEAN THAT IF TORONTO HYDRO TELECOM WERE GOING TO COMMIT TO SUCH A SIGNIFICANT CAPITAL INVESTMENT, A CONDITION OF THAT INVESTMENT WOULD BE ACCESS TO THE LICENSED BROADBAND SPECTRUM.

IT'S SIMPLY NOT FEASIBLE TO CONSIDER BUILDING A 630 SQUARE KILOMETRE NETWORK USING THE SAME UNLICENSED FREQUENCY AS MICROWAVES, CORDLESS PHONES AND GARAGE DOOR OPENERS.

OUR FRUSTRATION IS THAT, CURRENTLY, THERE IS NO LICENSED SPECTRUM LEFT TO ACQUIRE.

IF WE **WERE** ABLE TO TAP INTO THE LICENSED BROADBAND SPECTRUM, HERE ARE SOME OF THE BENEFITS I SEE:

- ENHANCED SCALABILITY
- FEWER ACCESS POINTS -- WHICH WOULD TRANSLATE INTO LOWER DEPLOYMENT COSTS.
- LESS INTERFERENCE -- WHICH WOULD RESULT IN BETTER SERVICE AVAILABILITY AND QUALITY.
- IMPROVED INDOOR SERVICE

WE FULLY AGREE WITH THE NOTION PUT FORWARD BY THE TELECOM POLICY REVIEW PANEL THAT INDUSTRY CANADA SHOULD RESERVE SOME OF THE AWS (ADVANCED WIRELESS SPECTRUM) OR 3G SPECTRUM FOR NEW ENTRANTS, RATHER THAN RESERVING IT FOR EXISTING MONOPOLIES.

ONLY BY HAVING NEW ENTRANTS WITH SPECTRUM TO COMPETE WITH INCUMBANTS CAN CONSUMERS EXPECT THE COST OF INTERNET ACCESS TO COME DOWN.

IT CERTAINLY DOES NOTHING FOR ANYONE TO HAVE REGULATIONS THAT CONTINUE TO FAVOUR THE SAME COMPANIES THAT, WITH THEIR OWN VESTED INTERESTS AT HEART, CONTINUE TO KEEP THE COST OF INTERNET ACCESS ARTIFICIALLY HIGH.

YOU WANT TO TALK ABOUT TECHNOLOGY AS AN ENABLER AND AN ECONOMIC LEVELER...THEN WE **ALL** NEED TO PUSH FOR REGULATORY CHANGE.

LEVELLING THE SOCIO-ECONOMIC PLAYING FIELD FOR CONSUMERS CERTAINLY REQUIRES THAT THE FIELD BE LEVEL FOR **ALL** INDUSTRY PLAYERS FIRST...AND NOT JUST FOR THE SELECT FEW.

BUT PUTTING THIS ASIDE – AND IT’S BY NO MEANS A MINOR POINT – IT’S IMPORTANT TO ACKNOWLEDGE WHAT TORONTO MIGHT LOOK LIKE -- AND HOW ITS ECONOMIC FORTUNES MIGHT IMPROVE -- IF THE ENTIRE CITY WERE ONE BIG WIRELESS BROADBAND ONE ZONE.

[PHOTO OF DAVE DOBBIN & MAYOR MILLER]

SO LET ME PROPOSE WHAT TORONTO MIGHT LOOK LIKE IF IT WERE BLANKETED WITH A ONE ZONE NETWORK.

IF ONE ZONE COVERED THE ENTIRE CITY, TORONTONIANS WOULD HAVE ACCESS TO A HIGH-END SERVICE WITH LOW INTERFERENCE. THAT’S BECAUSE, AS I SAID, A PRE-REQUISITE FOR FUTURE DEVELOPMENT IS ACCESS TO THE LICENSED BROADBAND SPECTRUM.

SECONDLY, TORONTONIANS WOULD BE REAPING CERTAIN ECONOMIC BENEFITS ... BECAUSE IF WE MADE THE DECISION TO GROW ONE ZONE, IT WOULD ONLY BE BECAUSE THE SMALLER ‘DOWNTOWN’ VERSION HAD PROVEN ITSELF PROFITABLE. THESE BENEFITS WOULD INCLUDE A LARGER DIVIDEND BACK TO THE SHAREHOLDER – A DIVIDEND THAT MIGHT THEN BE USED FOR A NEW PARK, NEW SERVICES, OR LOWER PROPERTY TAXES.

THIRDLY, TORONTONIANS WOULD BE PROUD TO KNOW THEY WERE LIVING IN ONE OF THE WORLD'S MOST EFFICIENTLY RUN CITIES – A CITY WITH EVERYTHING FROM BETTER MUNICIPAL SERVICES TO BETTER HEALTH CARE DELIVERY TO BETTER EDUCATION.

IT'S FINE TO HAVE BIG PLANS...BUT BIG IDEAS DON'T PRECLUDE BEING PRAGMATIC. OUR FIRST PRIORITY IS TO MAKE SURE ONE ZONE BECOMES PROFITABLE AND SUSTAINABLE.

ONCE IT MEETS BOTH THESE CRITERIA, THEN AND ONLY THEN CAN WE START TO THINK ABOUT EXPANSION.

THEN AND ONLY THEN CAN WE THINK ABOUT CORPORATE PHILANTHROPY AND CORPORATE SPONSORSHIP.

IN THE YEARS AHEAD, TORONTO HYDRO TELECOM MIGHT CHOOSE, FOR EXAMPLE, TO DEMONSTRATE LEADERSHIP BY INCREASING OUR SUPPORT FOR EDUCATION.

WHY EDUCATION? RESEARCH SHOWS THAT ACCESS TO THE INTERNET IS BY NO MEANS THE ONLY FACTOR THAT CONTRIBUTES TO THE SO-CALLED DIGITAL DIVIDE.

IN FACT, IT'S A STRANGE PARADOX THAT SOME OF THE WORLD'S POOREST COUNTRIES HAVE ACCESS TO THE INTERNET – WHICH IS SUPPOSED TO BE A GREAT ECONOMIC LEVELER. AND YET WHAT KEEPS THESE COUNTRIES AMONGST THE POOREST IN THE WORLD IS THEIR CITIZENS' LACK OF EDUCATION. THE SAME IS TRUE HERE AT HOME.

SCHOOLS AND LIBRARIES MAY BE WIRED, BUT ARE THEY TAKING FULL ADVANTAGE OF THAT CONNECTION BY OFFERING FULLY DIGITIZED BOOKS, FILMS AND MUSIC?

CLASSROOMS MAY HAVE ACCESS TO THE INTERNET BUT ARE CHILDREN LEARNING HOW TO BE CRITICAL THINKERS?

MUNICIPALITIES SAY THEY WANT WIFI ACCESS, THAT THEY WANT BLANKET COVERAGE, BUT DO THEY HAVE THE POLITICAL WILL TO RE-THINK THE REQUIRED CHANGES TO THEIR METHODS OF OPERATION TO BECOME A DIGITAL WORKPLACE?

JUST AS UNDERTAKING A NETWORK DEPLOYMENT IS NOT A SIMPLE ENDEAVOR, AS FAR AS I CAN TELL, THERE IS NOT A QUICK AND EASY SOLUTION TO THESE POINTS BECAUSE DOING SO REQUIRES A TOTAL RE-ENGINEERING OF HOW WE LIVE ... HOW WORK GETS DONE ... AND HOW BASIC SERVICES ARE PROVIDED. THAT'S WHY THERE NEEDS TO BE MORE PUBLIC EDUCATION ABOUT WHAT WIFI IS ... WHAT IT CAN ACCOMPLISH ... AND WHY IT'S A FORCE TO BE RECKONED WITH.

THE MAIN BENEFIT I SEE FOR ONE ZONE IS THAT IT CAN HELP A CITY LIKE TORONTO HELP ITSELF...BY ENABLING BETTER INFRASTRUCTURE AND BY IMPROVING EFFICIENCIES ... WHICH THEN FREES UP MONEY TO DO WHAT NEEDS TO BE DONE FOR PEOPLE ON THE OTHER SIDE OF THE DIGITAL DIVIDE.

THE OTHER BENEFIT IS THAT TORONTO HYDRO TELECOM COULD LEVERAGE ITS KNOWLEDGE OF WIFI NETWORKS BY PARTNERING WITH VENDORS, SUPPLIERS, INNOVATORS, AND UNIVERSITIES TO TEST NEW PRODUCTS, HELP BRING NEW PRODUCTS TO MARKET, AND PROMOTE BASIC RESEARCH. IN FACT, WE HAVE BEEN IN DISCUSSIONS WITH

PROFESSORS IN THE ELECTRICAL AND COMPUTER ENGINEERING AREA AT THE UNIVERSITY OF TORONTO TO TALK ABOUT THIS VERY THING.

THAT'S WHAT WE SUPPORT...AND THAT'S WHERE THE PROFITS WE PLAN TO GENERATE COME IN.

[PHOTO OF ONE ZONE COLLATERAL PIECE]

I'VE NOW COME TO THE END OF MY FORMAL REMARKS...AND I UNDERSTAND THAT THERE WILL BE AN OPPORTUNITY FOR QUESTIONS FROM THE FLOOR, MODERATED BY OUR CONFERENCE CHAIR.

LET ME SAY IN SUMMARY THAT UP TO NOW, ONE ZONE HAS BEEN ONE HECKUVA RIDE.

WE STARTED OFF WITH A VISION OF CREATING THE FIRST WIFI NETWORK OF ITS KIND IN NORTH AMERICA ... AND WE SUCCEEDED.

WE SET OUT TO BUILD A NETWORK THAT WOULD PUT WIFI AND TORONTO ON THE WORLD MAP ... AND WE SUCCEEDED.

WE WANTED A SCALABLE, SEAMLESS, ROBUST NETWORK THAT WOULD ALLOW USERS TO EXCHANGE AND DOWNLOAD INFORMATION QUICKLY ... AND ACCORDING TO RESEARCH FROM AN INDEPENDENT THIRD PARTY, WE SUCCEEDED.

WE BEGAN WITH AN ENTREPRENEURIAL MINDSET AND AS A SMALL TEAM OF EXPERTS, WE WANTED TO EXPERIMENT ... TO TEST OUR HYPOTHESIS THAT IT COULD BE DONE...AND WE SUCCEEDED.

AFTER MARCH 7TH, TIME WILL TELL JUST HOW SUCCESSFUL ONE ZONE WILL BE. ONCE WE KNOW THAT, I REALLY BELIEVE THE SKY'S THE LIMIT...BOTH FOR OUR LOCAL AND NATIONAL ECONOMIES...AND FOR THE WELL-BEING OF ALL CANADIANS.

THANKS FOR YOUR TIME AND ATTENTION. I LOOK FORWARD TO YOUR QUESTIONS.