

## Working with IT: Yes, it's possible!

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National Conference on Pavement Management

Norfolk, VA

May 6-9, 2007



#### So what is it about IT?



## Do you feel like you need this when you make a call?





## Maybe this is your relationship with IT?





# You are not alone! (and there IS hope)



## IT is often a sensitive topic

- They generally operate outside of the normal business lines
- Parts of IT often have a "no, we can't do that" attitude OR the perception of such an attitude
- IT controls a remarkable amount of our daily lives but often are not directly answerable
- Pavement management "geeks" are often computer savvy and frustrated by lack of control



## At one point, you probably had nearly unlimited control...



But that was taken away....



## So what happened?

- IT organizations have generally grown more security conscious restricting activities perceived as potentially dangerous
- Legislative or executive branch policies have been put in place that didn't exist years ago – again often security oriented
- IT has grown so large in many places that they <u>may</u> have forgotten that we are their customers, not their employees



#### Can we find a balance?



Maybe...

But it takes communication and persistence





## Can't cry over spilt milk...

• IT has a job to do – even we if we don't always see eye-to-eye...

Chances are, things aren't going to change

• PM professionals <u>have</u> to build bridges and communication conduits with various IT resources because we are one of the most intensive consumers of IT



#### What about NCDOT?



#### Limitations at NCDOT

- All Hardware and Software must be purchased and approved by IT
- All software installs have to be carried out by IT
  - Your local department support might be allowed to do it f it's innocuous enough
- Our database access is limited to updates to the existing tables we can't add/drop columns or tables
  - that's a DBA function
  - I often write the queries to do it, but it's executed only by DBAs



### OK, so how do we cope...

#### It's not easy!

First, find out who to talk to –
 IT is NOT homogeneous, you'll have to figure out who to deal with

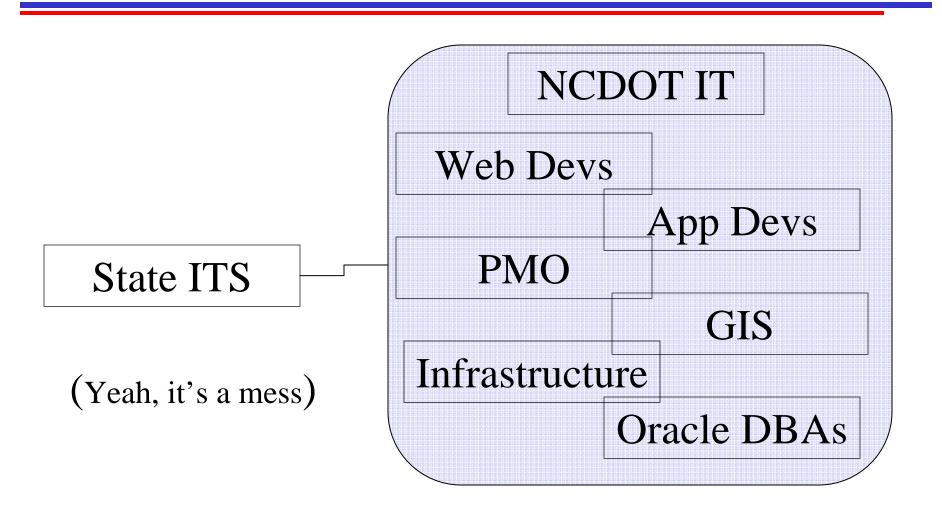
You are about to see why...



## So what sort of organization are we dealing with at NCDOT?



#### IT @ NCDOT





#### State Level ITS

- Sets policies that all NC State agencies must adhere to even NCDOT IT has a big brother
- Has the option of reviewing and approving all projects of more than \$100,000.
  - Internal AND external projects are scrutinized
- This agency was one of the biggest obstacles to PMS project launch partly because they had not clearly defined their own procedures



### Project Management Office

- NCDOT department responsible for managing and disbursing funds for IT projects – even if funded by non-IT sources
- Maintains onsite manager for many projects
- Reports monthly to State ITS
- Primary interface with other IT departments on large projects



#### **GIS**

- Provides highway network information to the PMS and other DOT consumers
- Did not previously have the capability of supporting or updating tabular information
  - Critical for our PMS implementation
- Their products are critical to maximizing benefit and minimizing maintenance effort for PMS
  - Will eventually allow varying DOT data to be shared across units on the same referencing system



### Application Developers

- NCDOT Pavement Management has multiple windows and web-based applications developed over time by DOT IT
- Even with a new PMS, software developed in the past will be important to provide data feeds and must be maintained
- We must maintain our current, positive relationships and contacts with the developers



#### Web Developers

- Our primary condition survey data input is via a web application
- Provide report applications for multiple data sets it's the public face of PMU
- The web devs are currently very popular and the lead time is long must get in the system (Documents! Requests!)



#### IT Infrastructure

- Maintains network and servers for DOT
- Servers running the PMS and the Oracle databases are "owned" by this group
- Often the most difficult to work with
  - Frequently understaffed and undertrained but provide a critical service – a quandary
- Documentation and plenty of lead time have helped us compensate for issues



#### Issues we've dealt with

- Getting Programmer Time
- GIS Delays
- Server delays
- Server problems
- ITS Approval



### It surely can't be all bad...

#### • Really it's not:

- PMU has had a long and positive relationship with programmers. It sometimes takes time to get on the schedule, but they work well with us
- The Project Management Office was absolutely instrumental in getting the current PMS project pushed through State ITS
- GIS is making a genuine effort to meet our needs – it's been a long road, but DOT will benefit



#### So what works?

- Face to Face meetings and regular communication!
  - Yes, it's old fashioned, but sometimes it's the only thing that works!
- Documents





## Meetings? Yep.

- They can be time sinks but they can also shine daylight on and put a face on problems
- Promote direct communication amongst involved parties
- Good documentation is also good evidence
  - If a date was missed and excuses made, it's best to be able to point to a real document, such as meeting minutes or a service agreement



### Meetings

## During the PMS Project we have met regularly with IT agencies:

- Weekly Project Management Meetings
- Biweekly GIS Meetings
- Biweekly Infrastructure Meetings
- It HAS made a difference we've built relationships (and reams of paper)



#### What else?

- Stay friendly!
- Keep yourself and the IT organization focused on the fact that a project is being paid for with public money
- Make sure senior management both business and IT understand what's at stake



## Thoughts to take away

- IT is NOT the enemy in the end, you work for the same agency
- Learn the procedures that must be used when dealing with IT
  - You like clear instructions and requests...so do they!
- Make sure that you express gratitude for jobs well done – seems trite, but it gets results and helps build relationships



### More thoughts

- Pavement Management Systems really are IT dependent, so we need IT assistance
- Knowing the right individuals can help you resolve problems more quickly – and with more civility
- Don't be afraid to request management support in particularly tricky cases



