115 Hollowoak Court
Cary, North Carolina 27513-3368
June 3, 2004

Marlene Dortch
Secretary
Federal Communications Commission
445 12th Street, SW
Washington, DC 20554

Re: WC Docket 92-105; FCC 04-111 – The Use of N11 Codes and Other Abbreviated Dialing Arrangements.

Summary: While the passage of Pipeline Safety Initiatives is a noble endeavor, the involvement of the telecommunications numbering arrangement sets a dangerous precedent that can affect the life span of the existing 10 digit North American Numbering Plan. In addition, there are a number of verbiage and technical interpretations in the NPRM that need to be corrected for universal understanding of differences between the various industry segments that utilize the NANP.

Dear Ms. Dortch,

The following pages contain my personal comments on the NPRM.

Respectfully Submitted

David H. Bench

David H. Bench, NCE
Telecommunications Engineer

Basis Assumptions:

- All telephone numbers in the area of the NANP are 10 digits in length. This has been a fact since 1947 and 10 digits are required for proper rating and routing of the call.

- N11 codes are not abbreviated dialing codes, they are access codes. Any code can be made to function as an abbreviated dialing code as determined by the service provider in switch translations.

- N11 codes were developed by the Bell System in the 1930s to route special access calls to telephone company services using minimum switch resources.

- The uses of the Star (*) and Number Sign (#) were developed by Bell Telephone Laboratories in 1958, as part of Dual Tone Multi Frequency (DTMF) signaling (aka Touch Tone). This was developed to speed up connections, minimize the provisioning of expensive switch resources and add revenue based services.

- Besides the United States, the NANP serves 18 other countries that utilize switching systems based upon the same network standards.

NPRM Title:

The title of this NPRM is "The Use of N11 Codes and Other Abbreviated Dialing Arrangements". This title leads one to believe that the decision has already been made to use an N11 Code to satisfy the legislation. In addition, the title leads one to believe that N11 Codes are abbreviated dialing codes, when in fact they are not.

Footnote Number 8:

Footnote number 8 states that "Pipeline Safety Act § 17. We note that a "three digit" nationwide toll-free number does not exist within the NANP. Thus, we are interpreting the statute to require an abbreviated dialing code to give the Pipeline Safety Act its intended effect".

I feel that this footnote is an incorrect assumption based upon statements made at the September 25, 2003 North American Numbering Council (NANC) meeting by Douglas Freberg II, Lead Lobbyist for the American Gas Association. Under questioning, Mr. Freberg stated that his organization helped Congress draft this legislation and that he was unaware that there was no such thing as a three digit telephone number.

The FCC and the DOT should remand this back to Congress to clarify their intention based on the fact that there is no such thing as a three digit telephone number. Congress should verify if they want a three digit access code or a nationwide toll free number. The two things are mutually exclusive.

NANC Recommendations:

The paragraph at Section 2, B, 5 states that the NANC recommended the use of 811 as a method of satisfying the requirement of the statute. This is not true. The NANC stated that 811 was the second best alternative. (see May 27, 2004 letter to Wireline Competition Bureau Chief William Maher from NANC Chair Robert Atkinson on this subject).

Abbreviated Dialing Codes:

As stated in my assumptions, N11 codes are not abbreviated dialing codes, they are access codes, by definition, since the 1930s. They can be made to function as abbreviated dialing codes, dependent upon uses and how they are set up in switch translations. Any code can be made to function in this manner. There are no pre-defined abbreviated dialing codes except those used by subscribers who subscribe to "Speed Call" features.

Codes Using a Leading Star or Number Sign:

While the sub-paragraphs of this section are true, the application of these characters are different across various industry technologies and segments that use NANP resources. The * and # sign were developed by Bell Laboratories in 1958 as part of DTMF signaling. In the wireline industry segment, this signaling is done, inband, between the subscriber set and a telephone switching system by use of the dual tones generated by the subscriber set. The uses of these characters has been standardized since the 1960s and is included in switch generic requirements. The * is used to precede a two or three digit vertical service code. In order to co-exist and provide vertical services to subscribers with rotary dial phones, the translation of 1-1 simulates the *. The # sign has never been officially used in the wireline segment as a prefix. Its use as an end–of-dial indicator has been in use since the 1960s and has been used as an Operator Services re-origination signal since the 1970s.

The wireless industry segment has never been integrated as a full network element and the signaling between the subscriber instrument and the mobile switch is different that wireline switches. The use of these characters in PBXs and voice mail systems is a whole different set of circumstances that is much to complicated to complete in this document.

In addition, preceding a three digit call with a character is still not complying with the letter of the law.

Any modification of the existing uses of * and # will require the development of new switch generic requirements that can be built to by switch vendors. This will delay implementation of deployment of any capability.

Establishment of 344 as an Abbreviated Dialing Code:

The use of any three digit code, other than an N11 code will involve the use of a future Area Code. This will remove eight million telephone numbers from the available number pool.

While 344 is not assigned as an Area Code, there are numerous Area Codes that have 344 working as a Central Office Code. Switch timing capabilities will need to be implemented in those areas that allow seven digit dialing, thus delaying the call.

Conclusion:

While the taking of just one code causes a minimal impact on future NANP exhaust, it sets a dangerous precedent for future legislative requirements for additional codes (i.e. Bridge Security, Canal Security, Landmark Security, etc.). Multiple legislative demands for additional codes will have significant impacts on the life of the existing 10 digit NANP, especially in light of the fact that the network still requires ten digits in order to properly rate and route the call. In fact, this call must route to at least 71 existing telephone numbers in order to function.

It is apparent from discussions that Congress developed this legislation without any knowledge of the workings of the NANP and nothing prevents this from happening again.