Chapter 24, Inc.
Madison, Wisconsin

*Society of Broadcast Engineers* *December 2002*

## OVERSEAS BROADCAST ADVENTURES

***By Kurt Miller***

A little over eight years ago, I accepted a position with Roscor Corporation as a project engineer overseas in a developing country. This job presented many unique obstacles as well as opportunities. In this article I discuss some of the obstacles.

I had just received a degree in Broadcast Technology Management with an emphasis on engineering from the University of Wisconsin-Platteville. However, the things I learned in school only prepared me for some of the obstacles on the technical side of the job. Working overseas, I soon discovered that not all of the difficulties encountered are strictly technical.

The first obstacle I discovered was, of course, the language. I was told when I accepted the position that I would not be required to learn a foreign language, since most of the clients had managers who could speak English. While it is true that most people who are middle level management or above usually have at least a working knowledge of English, very few operators have a command of the English language. Roscor also has maintained a local staff to help with installation tasks. Their English skills have expanded, yet remain limited. I soon decided that it would be in my own best interest to try and develop my local language skill as much as possible. Most of this was done with no formal training, so my skills were very conversational, and not too strong on formal language.

I soon discovered that speaking the local language had great benefits when trying to trouble-shoot problems. When I received trouble reports from middle level managers, they had often been filtered, altered, or changed. I found that by talking to operators directly I was able to get better details and more accurate reports of the kinds of problems and how often they were occurring.

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## Next Meeting:

**Tuesday, December 17, 2002**

**Holiday Celebration Dinner**

**at Timber Lodge Steak House**

**6613 Mineral Point Road**

**Happy Hour**
**6:00PM – 7:00 PM**
**Dinner at 7:00 PM**

**(see flyer for RSVP)**

## In This Issue:



## WISCONSIN AMBER ALERT

***By Leonard Charles***

Amber Alert is a concept developed by Texas law enforcement agencies and Dallas-Fort Worth broadcasters, following the 1996 abduction and murder of nine year old Amber Hagerman from Arlington, Texas. Its goal is the fast dissemination of detailed information surrounding a child abduction through media outlets to the public. The public then aids law enforcement in locating the fleeing criminal. Indeed, there have been several successful recoveries of abduction victims in areas served by an affective Amber Alert System. National statistics show that in abduction situations that resulted in death, that death occurs within the first few hours of the abduction. Hence the speed of dissemination is vital to successful victim recovery.

Planning of the Wisconsin Amber Alert System has been ongoing for the past year. An implementation target of the planning committee is the first quarter of 2003, and at this point looks very realistic as things come together. Here are the highlights of the system:

• Amber Alerts will be issued as EAS alerts over the Wisconsin Public Radio State EAS Relay system. These alerts will be location coded to one or more of 9 Wisconsin Amber/EAS Operational areas. Therefore, only stations in areas specific to the child abduction will actually receive/air the Alert.

• The new CAE (Child Abduction Emergency) event code will be used for Amber Alerts. This is the only use of the CAE code, so automated forwarding is highly recommended.

• Amber Alerts will only be issued

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# CHAPTER 24 OFFICERS

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## COMMITTEE APPOINTEES

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| | |
|---|---|
| Denise Maney | 277-8001 |
| Steve Paugh | 277-5139 |
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# November Business Meeting Minutes

Chapter 24 of the Society of Broadcast Engineers met on Thursday, November 21, 2002 at the Wisconsin Public Broadcasting Center in Madison, Wisconsin for the chapter's monthly meeting. There were 17 members in attendance, 12 of whom were certified, and 5 guests.

The meeting was called to order at 7:09 PM by Chair Tom Smith. Newsletter editor Mike Norton announced the deadline for articles for the December issue will be due at midnight, Friday, December 6th. The folding party will be held Wednesday, December 11th at 5:30 PM at WKOW-TV.

Denise Maney of the Program Committee announced that the December meeting will be a holiday get-together at the Timber Lodge Steak House on Tuesday, December 17th. Spouses and significant others are invited. Please RSVP by either email or phone to Denise by Friday, December 13th. The January program will be a presentation by Sony and the February program will be at the Madison Media Institute.

Chair Tom Smith thanked Lonnie Cooks and everyone else who setup and manned the booth at the Broadcaster Clinic. He also thanked Steve Paugh and Jason Mielke for their work on the DTV web site.

It was announced that the next National SBE meeting will be hosted by the Madison chapter during next year's Broadcast Clinic. Vicki Kipp was thanked for her efforts in completing the application, which was noted to be the best package received. The chapter will need to cover some of National's expenses. Annual dues will be increasing $5 next year. The current dues of $55 have remained the same over the last 10 years.

Certification Chair Jim Hermanson announced that Mike Norton and Vicki Kipp both received their Senior Broadcast Engineer TV certification. The next testing period will be February 7-17, 2003. Application deadline is December 31, 2002. Applications are available on the national web site.

Sustaining Membership Chair Fred Sperry announced two renewing memberships of Belden and Norlight and a new membership of Heartland Video, bringing the total to 24 sustaining members. Membership Chair Paul Stoffel asked to let him know if any member had not been receiving the newsletter.

Steve Paugh reported that the DTV web site will be revamped based on feedback received. Planned changes are multiple reception report filing and demographic reporting information. Dave Janda from the Dane County Emergency Management office reported that he was working on an update to the EAS plan. He was hoping to use the new event codes, but as they rely on the National Weather Service for relaying the information and the NWS will not be using the new codes until August 2003, the new codes will not used. The use of the new codes will be revisited later and should not be an issue.

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## NEXTWAVE SAGA ENDS WITH REFUNDS

***By Tom Smith***

The FCC has refunded the last of the money that was collected from Auction Number 35. This was the auction for the licenses that NextWave Personal Communications Inc., NextWave Power Partners Inc., and Urban Comm-North Carolina Inc. had defaulted payment on and sued for bankruptcy relief in order to hold onto them. The FCC held a second auction of the defaulted licenses that raised $35 billion, which was a large increase of value for the disputed spectrum when compared to the original bids from NextWave of $4.7 billion. A Federal Court ruled that the FCC violated bankruptcy laws by denying NextWave time to make the payments under the bankruptcy rules. The FCC has since returned the licenses to NextWave.

The FCC had retained three percent of the money collected from the second auction and considered their licenses pending even after the court ordered them returned to NextWave. The FCC has returned the money and waived the default rules for these bidders in the second auction. They noted that the FCC was not required to provide relief to the bidders and that this action would assist those communications companies enduring economic difficulties in the telecommunications industry.

*From FCC Press Release. (www.fcc.gov)*

Thanks to Fred Sperry for arranging the November program by Panduit and Belden on Category 5e/6 cable and termination.

Thanks to WKOW-TV for providing copying and folding facilities for the Chapter 24 newsletter!

Thanks to WISC-TV for maintaining the web server for the Chapter 24 Web page!

## AMATEUR RADIO NEWS

***By Tom Weeden, WJ9H***

• Amateur radio equipment manufacturer Ten-Tec and broadcast transmitter maker Thales have announced that they've used an amateur radio linkup to span the Atlantic on high-frequency digital voice for the first time. Ten-Tec's Doug Smith, KF6DX, and Thales' Didier Chulot, F5MJN, successfully transmitted and received HF digital speech signals November 22 between Paris, France, and Ten-Tec's Sevierville, Tennessee, headquarters.

Calling it "a major breakthrough," a Ten-Tec news release said the two amateur stations "demonstrated the advantages of digital audio during the conversation, including noise-free, FM-like reception and the potential for simultaneous voice and data." The feat was accomplished using Ten-Tec amateur transceivers and Thales Communications digital audio software. Operating as F8KGG, Chulot spoke with Smith for several minutes over the HF digital link, operating within a 3-kHz bandwidth. The contact occurred on 15 meters on 21.218 MHz.

"The rigs F5MJN and I used are unmodified," Smith said. "They are being used in regular upper-sideband mode." No additional hardware was required beyond the cables connecting the transceiver and the microphone to the PC sound card.

In terms of audio quality, Smith recorded a "mean opinion score" (MOS) of 3.5 out of a possible 5 in the QPSK mode, which runs at 1200 bits/sec. An MOS of 3 is generally defined as toll-quality—roughly the same as conventional telephone audio quality. Signals were also exchanged in 16-QAM mode at 2400 bits/sec.

The Ten-Tec/Thales system is based on a new international broadcasting standard adopted last year by the International Telecommunication Union (ITU). The digital broadcast signals occupy up to 10 kHz of bandwidth. The FCC recently approved the similar in-band/on-channel (IBOC) standard for AM broadcasting in the US. An amateur radio version of the Thales system is expected to appear on the market early next year, but Smith says he has no information on the software's cost or distribution.

• Accompanied by the worst power outages since Hurricane Hugo in 1989, a severe snow-turned-ice storm swept along through the Carolinas early Thursday, December 5, prompting area amateur radio operators into action to help with the emergency.

"SKYWARN nets operated overnight across the state, providing the National Weather Service updated information on changing ground conditions," according to ARRL North Carolina Section Public Information Coordinator Gary Pearce, KN4AQ.

With widespread power outages, tree-blocked roads, and temperatures uncharacteristically in the 20s, a number of North Carolina Amateur Radio Emergency Service groups activated in their communities, and hams provided support at numerous shelters across the state. The North Carolina state Emergency Operations Center in Raleigh was staffed with hams helping to pass traffic between there, the county EOC, and the state's 25 open shelters.

*(Excerpts from the American Radio Relay League's web site: www.arrl.org)*

## OVERSEAS BROADCAST ADVENTURES (continued from page 1)

One example of this was a customer who said they were receiving several hundred calls a day complaining of problems with their transmission. Roscor decided to put a complaint form at the telephone operators desk. We checked back after two weeks, and there had been no calls. Other times, Roscor would get complaints from managers, but by the time the problem would get to the manager level all of the details had been lost. We would get a complaint like, "system A just doesn't work." However, if I would go and track down the people who use it every day, I would get the exact details of what doesn't work and when it doesn't work.

Another obstacle in dealing with the language barrier is in training the customers. The training that Roscor offers on most systems is usually conducted in English, and all of the manuals for technical gear are in English. We have on occasion supplemented the English training with translations from a native speaker. I discovered what this causes is a lot of the technical operations staff to become what I call "button pushers," meaning that the only features of a piece of gear they will ever use is what someone else showed them how to use. I assume this mentality exists somewhat in the US also. The difference in the US is that a motivated individual can pull the manual off the shelf (assuming someone has not misplaced it) and find out how to use more features. Unfortunately here, unless the person has a pretty good handle on the English language (which most operators do not have), they are stuck asking someone to demonstrate everything for them.

Another common obstacle in developing countries is the chaotic distribution of electricity and the resulting poor power quality. In the country where I am working, the main electrical power is provided by a state run monopoly that at times is under-funded (or mismanaged) to the point that electrical power distribution is not dependable. Any facility that is intended for 24 hour operation or non-stop operation during extended hours of the day usually provides their own generator and UPS power backup system. (Yes, you can imagine that selling generators is a very active business.) Besides the reliability of the power, the quality is often a problem as well. Most often this goes hand-in-hand with the installation techniques practiced.

My first experience with faulty power was while walking through a facility that was in the construction phase. The contractors were operating several power tools throughout the building (drills, grinders, etc.) but not one standard electrical cord was being used. It was a jumble of wires with bare ends simply twisted together, or bare wires held in electrical wall outlets with small slivers of wood. Now, that is during an installation—so you would think that thing get better once the job is finished. *Not necessarily.*

Usually things look good on the surface, but open up a few ceiling tiles or electrical panels and one will discover what is behind the scenes. The jumble of cables that used to be strewn across the floor, is now strewn above the ceiling. In a country where there is no published, or at least enforced, electrical standard, it is not uncommon to find any color being used for anything. In a 5 wire electrical feed (3 phase, neutral and ground), it is not unheard of to see the color that is supposed to be used for ground reused for neutral and or even the phases. It just depends on what extra cable the contractor had lying around.

The next major problem with most installations is grounding. Very few people understand even the basic concept of what grounding is for, so it is often done very incorrectly. Seeing (50 cycle) HUM on analog monitors is a very common occurrence. When running cables between different parts of the same building, it is almost guaranteed that the grounds will be at different potentials. Most people even consider grounds optional or not necessary. If those people are asked to explain why, they will say that power tools still work and light bulbs still light up with no ground connected.

On one job, we were one of several contractors involved in the project (others included the generator vendor, telephone/PABX vendor, among others). Each of us had a concept of how we thought the grounding should be connected and installed. So rather than weigh all of the options and make an informed decision, the customer's project manager decided we should all vote on how it should be done. Unfortunately Roscor lost the vote, and to this day there are issues with their grounding and power system. None of the other vendors are back for future projects, but we keep having to make the system work with the way it is installed.

Even when Roscor gets full say as to how the power system should be done and we submit a comprehensive document and drawings of how the grounding and power distribution should be wired, what gets built is seldom exactly what is called for. The problem is, most of the time, the deviations are buried above ceilings and inside grounding stake holes, or

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## WISCONSIN AMBER ALERT (continued from page 1)

under strict criteria and will be funneled through one clearing government agency to guard against misuse. That agency's EAS encoder will actually issue the Alert.

• Alerts will also be sent to a subscription email list and will be available on the web site http://www.amberalertwisconsin.org. Television stations can download the photos for air.

• There will be a total of 7 follow-up alerts issued on a schedule over five hours following the initial alert unless the abduction is resolved within that time. Updated information including the text message and any available photos will be published immediately on the web site.

• Every alert will be reviewed by the Wisconsin Amber Alert Review Committee. Changes can be recommended by that committee based on the review of previous activations.

• Reciprocal agreements are being formulated with adjacent States for activation across common borders. Some of those States are ready now, while some are ramping up.

This system was not developed in a vacuum. The planning committee is made up of many commercial broadcasters, Wisconsin Public Radio, the Department of Justice, law enforcement officials, National Weather Service officials, and members of the Wisconsin State Emergency Communications Committee, which oversees the State's EAS Plan. The Committee is co-chaired by John Laabs, the Executive Director of the Wisconsin Broadcasters Association and Gary Timm, the Wisconsin SECC Chair.

As a Wisconsin Broadcaster you will soon be receiving details from the WBA. Though the system is voluntary, your station is urged to participate. Included in the WBA information packet will be instructions to subscribe your station for the email alert-distribution list.

You should also be preparing to upgrade your EAS unit to include the new codes authorized for use by the FCC. There is information on the Chapter 24 web site on manufacturer's upgrade plans, which can be found at http://www.sbe24.org/eas/encode.asp. All stations are urged to upgrade their EAS units as soon as their manufacturer establishes an upgrade path.

## OVERSEAS BROADCAST ADVENTURES (conclusion)

other places that one really has to dig for. Just recently I spent a few hours trying to figure out why a time code card was not working correctly in an automation system PC. The system has several PC's that have the same hardware, so I began swapping parts. It was not until I had swapped the entire PC that I discovered the difference was that the PC worked in one room, but not in the other. I found out that the power outlet where the PC was plugged into had a floating neutral connection. I plugged the PC into a different power source and everything worked fine.

Another obstacle is product delivery time. When troubleshooting it is important to keep in mind that a priority Federal Express shipment from the U.S. is typically 5 days. In the US it is possible to get over-night delivery of a part in emergency situations. Where I am working, the best case scenario is 4-5 days to receive a part or item by Fed-Ex or other courier service. This is the best case scenario where things are shipped via courier. If it is a large equipment shipment where the items must clear customs and several freight forwarders deal with the shipment, it can take anywhere from one and half months to as long as four to six months to get the shipments on-site. Try making an accurate project schedule with those kind of variable in the mix.

These are just a few of the obstacles faced. Maybe next time I will get to some of the opportunities.

## EMAIL LIST MAINTENANCE

***By Leonard Charles***

The following addresses have become invalid or duplicate, and have been deleted from the Chapter 24 email list (msnsbe@broadcast.net):

aa7cs@idcnet.com
john@me-a.com
lloydberg@earthlink.net
mattymo@inexpress.net
mcroom@execpc.com
oestreich@uwplatt.edu
rais81@hotmail.com
twaggoner@amfm.com
whpnu57eng@gdinet.com

The Chapter 24 email list is offered for the ease of exchange of information appropriate to Broadcast Engineers of Southern Wisconsin. Sales or solicitation messages are frowned upon. You must be a member of the list to send messages to it. If you'd like to become a member of this list go to http://www.broadcast.net/mailman/listinfo/msnsbe and fill out the short section entitled *Subscribing to MSNSBE*.

# FCC Rulemakings

***Compiled by Tom Smith***

**FINAL RULEMAKINGS**

**ET Docket No. 01-75**
**Revisions to Broadcast Auxiliary Service Rules In Part 74 and Conforming Technical Rules for Broadcast Auxiliary Service, Cable Television Relay Service, and Fixed Services in Parts 74, 78, and 101 of the Commissions Rules**

**RM-9418**
**Telecommunications Industry Association, Petition for Rule Making Regarding Digital Modulation for the Television Broadcast Auxiliary Service**

**RM-9856**
**Alliance of Motion Picture and Television Producers, Petition for Rule Making Regarding Low-Power Video Assist Devices in Portions of the UHF and VHF Television Bands**

The FCC has released a Report and Order that allows for digital modulation in the Television and Aural Broadcast Auxiliary Service bands. The new rules also cover coordination in these bands, application procedures, and channel splitting in the Aural Remote Pick-up Bands. There are rules changes concerning the use of the Universal Licensing System and the creation of new low power TV devices called Wireless Assist Video Devices.

The FCC in this Report and Order overhauled nearly all of the part 74 and some of Part 78 Rules. The release runs 117 pages and 46 pages are the actual rules with the rest of the release being the discussion and summary of the rule changes.

In these new rules, the FCC will now allow digital modulation in the broadcast auxiliary bands without the need for Special Temporary Authorization. The digital transmitters will have to use the same emission masks as Part 100 microwave transmitters use. This will standardize the equipment in both services, particularly were they overlap. The rulemaking also addressed the dual digital-analog microwaves and that their emission masks will be handled as whatever modulation method occupies the greater bandwidth. A digital mask is used if the digital part of the transmission occupies over 50 percent of the bandwidth, a analog mask is used if the analog part of the transmission occupies over 50 percent the bandwidth. The FCC also addressed emission designators creating designators for hybrid operation.

In the 950 MHz Aural band and in the TV microwave band, the FCC has set new limits on Effective Radiated Power for short paths (17 KM or less) and tightened frequency tolerances on new equipment, which will take effect in two years. The FCC also declined to phase out fixed links in the 2 GHz band, but digital operation will be prohibited on short fixed links in this band.

There are new restrictions on the use of UHF-TV channels for TV STL's. They will be limited to the new UHF-TV core channels of 14 through 51, must be vertically polarized, have an antenna beamwidth of 25 degrees or less, and a maximum ERP of 35 dBW.

A new channel segment plan will be used for the VHF and UHF aural Remote Pick-up Band. This is to match the land mobile bands that surround them. Channels in the VHF band will be split into 7.5 kHz channels and each licensee will be able to stack up to four channels for a total of 30 kHz. In the 450 MHz band the channels will be 6.25 kHz and they can be stacked up to eight channels for a bandwidth of 50 kHz in the N1 and N2 groups and stacked up to two channels in the P group. The 166.25 and 170.15 MHz channel will have a bandwidth of 12.5 kHz.

In this notice, the FCC created a new broadcast auxiliary service: Wireless Assist Video Devices. These are low-power TV modulators that are hooked up to an antenna instead of a cable. There purpose is to feed monitors with camera video during movie or video production. The transmitter's output is limited to less than the normal cable modulator and they can operate on Channels 7 through 51 only. They must be licensed like wireless mikes that operate on TV channels. They are limited to 250 mw, must have a permanently attached antenna or special antenna connector to prevent use of an unauthorized antenna, operate on a TV channel with 6 MHz bandwidth, and cannot operate within 129 KM of a TV station on the same channel. They must coordinate with a local coordinator and if one is not available, they must notify all co-channel and adjacent channel stations within 161 KM.

The part that is the biggest change for broadcasters is that 950 MHz Aural transmitters and TV microwave applicants must file using Part 101 forms and procedures, and aural Remote Pick-up Stations must use Part 90 (land mobile ) forms and procedures. In the TV microwave band, broadcasters get an even bigger change in the rules. Any applicant for a fixed station in all bands above 2110 MHz will be required to coordinate with a Part 101 coordinator, as will mobile

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# FCC RULEMAKINGS (continued)

operators in the 6425-6525 MHz and the 17.7-19.7 GHz band. A Part 101 coordinator is normally a commercial service. The coordination process will likely require forms to be sent to the coordination service and received from them before application. Transmitters in the 1990-2110 MHz band and mobile units in the 7 GHz and 13 GHz bands will still need to be coordinated by a local coordinator.

This document has a lot of changes for the broadcaster in their use of the Broadcast Auxiliary Bands. There are other changes which may not be as big as those discussed, but anyone planning a system on these frequencies should be aware of the changes. Downloading the Report and Order may be helpful in understanding and dealing with these changes. The web address is http://hraunfoss.fcc.gov/edocs_public/attachmatch/fcc-02-298A1 with either doc, pdf or txt for file type or the document can be linked from the Daily Digest for November 13th at www.fcc.gov/Daily_Releases/Daily Digest/2002/dd021113.html.

**MM Docket No. 98-204**
**Review of the Commissions Broadcast Equal Employment Opportunity Rules and Policies**

The FCC has made another attempt to create rules concerning equal employment opportunities. Past rules on EEO have been struck down in Court and required the FCC to revisit the issue. The new rules cover broadcasters, the cable industry, the direct satellite industry, and other multichannel video programming distributors.

When recruiting new employees, any broadcasters with five or more employees is required to widely disseminate information concerning each full time (30 hours or more) job vacancies except those filled in urgent circumstances. They must provide notice to any recruitment organizations that have requested such notice. Any broadcaster with five to ten employees must hold every two years two long term recruitment initiatives such as job fairs, internships, scholarships, or other community events to inform the public of job opportunities in broadcasting. Small multichannel video suppliers such as cable must have six or more employees to be required to come under these rules. Everyone covered under these rules with more then ten employees must do these initiatives four or more times in a two year period.

All employers must collect information on the filling of all full time vacancies that includes the title, recruitment sources with copies of notices sent and to whom, number of interviewees and their source of information for the job opening, the date the job was filled, and the source that referred the hiree. This information must be placed in the public file along with information about hiring initiatives that the employer has used in the past year.

All stations must submit the EEO public file to the FCC at license renewal, and at the halfway mark of the license term for TV stations with more than ten employees and radio stations with more than five employees.

The FCC is also issuing a Notice of Proposed Rulemaking seeking comment on applying EEO rules for part-time positions.

This action was taken on November 7, 2002.

**PROPOSED RULEMAKINGS**

**MB Docket 02-277; FCC 02-249**
**2002 Biennial Regulatory Review-Review of the Commission's Broadcast Ownership Rules and Other Rules Adopted Pursuant to Section 202 of the Telecommunications Act of 1996**

**MM Docket No. 01-235**
**Cross-Ownership of Broadcast Stations and Newspapers**

**MM Docket No. 01-317**
**Rules and Policies Concerning Multiple Ownership of Radio Broadcast Stations In Local Markets**

**MM Docket No. 00-244**
**Definition of Radio Markets**

The FCC has extended the time that it will accept comments in its review of broadcast ownership rules (see October newsletter). The new deadlines are now January 2, 2003 with reply comments due on February 3, 2003. This is a one month extension from the original dates.

The FCC also released some data sets that were used in used in studies that the FCC has released as part of the record in this review. These data sets are available at the FCC headquarters only, and require those who view the studies to sign a confidentiality waiver.

Chairman Michael Powell also announced on December 4th that the Commission will hold a public hearing on media ownership issues in Richmond, Virginia in February, 2003. Details will be released later.

The notices for this rulemaking and

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## FCC RULEMAKINGS (continued)

copies of the studies are available at www.fcc.gov/media.

**ET Docket No. 02-135**
**Spectrum Policy Task Force Report**

On November 7th, the Commissioners received the Report from the Spectrum Policy Task Force with their recommendations to modernize the rules on spectrum management from the present "Command and Control" model to a more flexible consumer-oriented model. These reports were released on November 15th.

This report is a result of a written comment period that was held in June of 2002 and four public workshops which were mainly open panel discussion amongst FCC staff, academia, manufacturers, spectrum users, communications attorneys, consultants, and consumer groups. Each workshop covered one group of issues and produced its own report. The four groups of issues covered included Experimental Licenses and Unlicensed Spectrum, Interference Protection, Spectrum Efficiency, and Spectrum Rights and Responsibilities. The Task Force, which consisted of all FCC personel, produced a final report that summed up and made conclusions from the other reports. On November 15th, another report in the form of a proposal was released on the Rapid Transition to Market Allocation of Spectrum which the two authors, whom were FCC staffers, proposed the reallocation and auction of 428 MHz of spectrum between 300 and 3000MHz. They included the ITFS/MMDS Band, the 2 GHz MSS Band and the 1710-1755 MHz and 2110-2165 MHz bands to be auctioned. The FCC has auctioned some spectrum in the ITFS/MMDS band in the past for MMDS use.

The Task Force proposes less of the traditional spectrum management methods which are referred to as the "Command and Control" model and more of the use of the "Exclusive Use" model where one licensee would have exclusive rights to specified spectrum in a defined area with flexible use of the spectrum, including leasing parts of it to other users. This model would be interference protected. The second model that the task force proposed for part of the spectrum is the "Commons" model in which unlimited number of unlicensed users share with no interference protection. This is used today in the unlicensed 900 MHz and 2.4 GHz bands for uses such as cordless phones and wireless LANs.

In the report, the Task Force recommended that broadcasting remain under traditional spectrum management for now.

Other recommendations include new interference standards, including receiver standards, use of so-called white areas between existing users, timesharing, and rules defining the users interference rights and responsibilities. There is much discussion of spectrum restructuring, use of auctions, and the use of new technologies in solving interference problems in these reports.

This report discusses these issues and others in great length and needs to be fully read to fully understand the implications that these proposed policies would create. The main report is 69 pages and the four Workshop reports are a total of 185 pages, with the Proposal for a Rapid Transition to Market Allocation of Spectrum running 68 pages.

Any actions resulting from this report could cause major changes in how spectrum is managed and how current users of spectrum will survive the future.

Comments are due on January 9, 2003 and replies are due on February 10, 2003. All of the reports can be found at www.fcc.gov/sptf.

*From FCC Releases (www.fcc.gov)*

## FCC LOCAL LEGALS

***Compiled by Tom Smith***

**PROPOSED**

**New FM, 106.7 MHz**
**Mount Horeb, WI**

David and Lynn Magnum wish to transfer the Construct Permit for a new FM in Mount Horeb, WI to Midwest Management Inc. of Madison for $2,166,000. Midwest Management is headed by Thomas A. Walker. They operate a number of stations in Wisconsin and the Midwest, including extended band station WTDY-AM and its paired license WMLV (AM), WTUX (AM), WMGN (FM), WJJO (FM), WWQM (FM) and a construction permit for WHIT-FM. All of these stations are located in the Madison area with studios located in Madison.

The FCC granted the Magnums the construction permit for the new FM on October 3, 2002 (see November's *LOCAL LEGALS*). The notice for the application to sell the construction permit was released on November 5, 2002.

*From FCC Releases and Databases (www.fcc.gov)*

## MEETING MINUTES (continued from page 2)

He is also looking for feedback on the plan that the Dane County 911 center will forward alerts to the NWS which will then send the alert out both via the weather radio and the weather wire so that stations can receive the text of the alert. He is interested in how many stations have the Weather Service as an input to their EAS, as well as how many stations are setup to receive the civil emergency code. A survey will be distributed via the list server.

Frequency Coordinator Tom Smith reported that the only football coordination received was from ABC for the Ohio State game, which was received the day before the game. Other coordination requests were from Bob Wundrock of ECB for a VHF RPU between the Dane County City/County building and the ECB for statewide EAS purposes. Kevin Peckham of Sony had made a request for some wireless microphone frequencies.

He also reported that the new Part 74 rules were available on the FCC web site (117 pages). Digital modulation has been approved and the FCC would be distributing new licenses. Fixed links of 7 and 13 GHz now require Part 101 coordination. The FCC Chairman's spectrum report was also now available. The FCC also has changed their web site search engine making it easier to find information as well as the ability to print licenses instead of the shorter information.

It was noted that the attendance of the recent Broadcasters Clinic was down, possibly reflecting tighter business conditions. There is concern about keeping the numbers up and they are looking for new ideas to help in promoting the event, in addition to reaching other groups. Email your ideas to Tom Smith.

Larry Rusch of WHA-TV will be retiring Friday, November 22nd. Mike Norton received a plaque from the National SBE, citing him for the Best Chapter Newsletter (Class B) of 2001. Tom Smith also received a plaque for Best Chapter Frequency Coordination Effort (Class B) for 2001.

There was no old business. The meeting adjourned at 7:41 PM. The program this month was a hands-on demonstration of terminating category 5e/6 cable presented by Don Heinzen of Belden and Peter Martin of Panduit.

*Submitted by Jim Magee, Secretary*

## NEW FCC COMMISSIONER SWORN IN

***By Tom Smith***

The FCC now has its full complement of Commissioners. Jonathan S. Adelstien was confirmed by the Senate and sworn in as the fifth FCC Commissioner. The FCC has been operating with four Commissioners for some time. Adelstien will fill the second Democratic seat.

Adelstien is 40 years old and was born and raised in Rapid City, South Dakota. He has a B.A. from Stanford in Political Science and a M.A. from Stanford in History. He also studied at the Kennedy School of Government at Harvard. He spent time as a teaching assistant at Stanford and a teaching Fellow at Harvard.

He has served as a staff member in the U.S. Senate for the last 15 years, serving in the office of Democratic Senate Leader Tom Dachle (D-SD) for the last seven. He is married and has a one and a half year old son. His term ends on June 30, 2003.

## CHAPTER 24 SUSTAINING MEMBERS

**WELCOME TO OUR NEW SUSTAINING MEMBER:**
**Heartland Video Systems**

**RECENT RENEWAL:**
**Norlight Telecommunications**

**THANKS TO ALL OUR SUSTAINING MEMBERS:**

**Alpha Video**
**Belden Wire and Cable**
**Broadcast Richardson**
**CTI**
**Clark Wire and Cable**
**Fujinon Inc.**
**Graybar**
**Harris Corporation**
**maney-logic**
**National Tower Service**
**Panasonic Broadcast**
**Roscor Wisconsin**
**Ross Video**
**Scharch Electronics**
**Sony Broadcast**
**Swiderski Electronics**
**Token Creek Productions**
**Wisconsin Public TV**
**WISC-TV 3**
**WKOW-TV 27**
**WMSN-TV 47**
**WMTV-TV 15**

SBE Chapter 24 Newsletter
2029 Greenway Cross #11
Madison, WI 53713-3000

FIRST CLASS MAIL

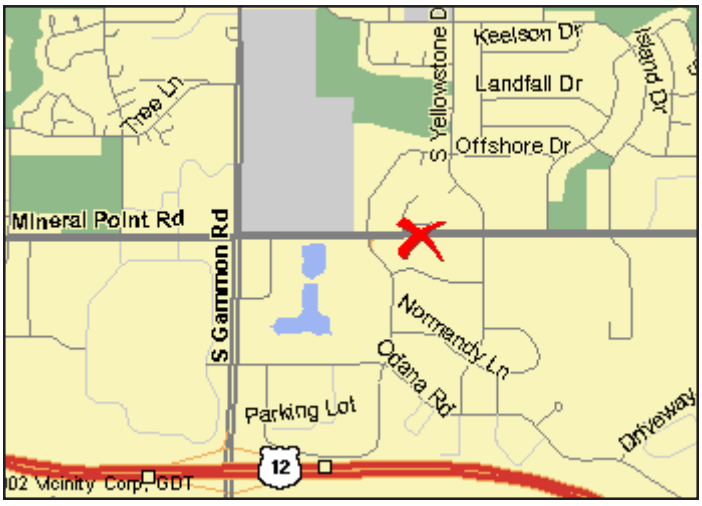
**Newsletter edited on Pagemaker 7.0 by: Mike Norton**
**Contributors this month: Leonard Charles, Jim Magee, Kurt Miller, Tom Smith, and Tom Weeden.**
**Thanks to Leonard Charles for his work on the Chapter 24 WWW page.**

# DECEMBER MEETING and PROGRAM

## Society of Broadcast Engineers
## CHAPTER 24 MADISON, WISCONSIN
## Tuesday, December 17, 2002

## SBE Holiday Celebration Dinner

**Timber Lodge Steak House**
**6613 Mineral Point Road**
**Madison WI**
**Fireplace Room in Back is Reserved**
**6 - 7 P.M. Happy Hour**
**7 P.M. Dinner**




**Deadline for RSVP is December 15th. Include your name, guest name(s), number attending dinner.**

**Please email or call Denise Maney, Program Committee**
**Email: Denise@maney-logic.com or sloop26@aol.com (subject: SBE dinner); or call 277-8001 to leave a message.**

**Visitors and guests are welcome at all of our SBE meetings!**

2003 UPCOMING MEETING/PROGRAM DATES:

| Day | Date | Program |
|---|---|---|
| Wednesday | January 15, 2003 | Sony at WISC-TV/UPN14 |
| Thursday | February 20, 2003 | Madison Media Institute Tour |
| Thursday | March 20, 2003 | T. B. A. |

| Program Committee: | Denise Maney 277-8001 | Steve Paugh 277-5139 | Fred Sperry 264-9806 | Steve Zimmerman 274-1234 |
|---|---|---|---|---|