April 2006 Volume 04-2006

Nacogdoches Amateur Radio Club

2006 CLUB OFFICERS

President: Tom Atchison – W5TV

VP: John Chapman – KC5MIB

Sec/Treas: Army Curtis - AE5P

APRIL MINUTES

The April meeting of the Nacogdoches Amateur Radio Club (NARC) was held as scheduled on April 5th. Twenty-six members and seven guests were present. **Vice-President John, KC5MIB**, opened the meeting at 7:00 p.m. in the Bailey Library of Christ Episcopal Church. Each person present introduced himself. Minutes of the previous meeting were approved as published. Treasurer's report was read.

Simulated Emergency Test is planned for Wednesday, May 3rd. Everyone needs to get familiar with the ICOM IC-2720 radio and with Winlink in preparation for this exercise. Winlink training is planned for next Thursday, 7:00 p.m. in Lufkin.

Discussion held on the upcoming Field Day. The park and pavilion are reserved for us. We need to build HF bandpass filters. **Mike, KD5PFQ** and **Howard, KI5KR** will do the food.

Howard, KI5KR, Jerry, K5JLW, and **Kent, KD5SHM** were appointed to a committee to explore and make recommendations back on possible club construction projects. The committee has now met and for a first project is a roll-up 2 meter J-pole.

Reminder that Belton will be April 22.

Meeting was adjourned at 7:40 p.m.

Program: Marshall, K5QE showed off a 432 antenna. **Andy, KE5EXX** showed off some Anderson power poles and adapters he has made. **Jerry, K5JLW** showed off a foxhunt antenna. **Robert, KD5FEE** showed off a solar panel. **Howard, KI5KR** showed off a roll up ground plane antenna, and **Kent, KD5SHM** showed off a roll-up J-pole and 222 xverter he is building.

PRESIDENT'S CORNER

I'm disappointed that I was not able to make the

April meeting; however, I understand you had an excellent meeting. I just want to remind you that we have Field Day coming up soon. Field Day begins at 1800 UTC on June 24 and ends at 2100 UTC on June 25. There is an announcement in QST for May 2006. Full Field Day rules and information packet may be downloaded at www.arrl.org/contests/forms. Field Day is an operating event designed to test emergency preparedness in less than optimal conditions. It will give us a chance to share ideas and exchange information with thousands of hams all over the United States. Please mark your calendars and participate in this event if you can. Even if you can only spend a brief time at the operating site, I believe you will enjoy the time. Also, I urge you to operate one of the stations we will have going during that weekend.

The next NARC Meeting will be on Wednesday, May 3. Please come and share anything new or different you may have related to amateur radio.

73 de Tom, W5TV

V.P.'s CORNER…

When you go conferencing, you never know who you will meet. I was in Las Vegas for the National Association of Broadcasters convention. Of course there are broadcasters everywhere, old friends, vendors you've done business with and always new people to meet. At Bob Heil's booth I met the New ARRL President-Joel Harrison. He's from Arkansas and knows where Nacogdoches is. He's traveled through. I gave him the repeater data for his pass through, so please listen up and give him a warm welcome. I will tell you that in my travels, Nacogdoches has always had a welcome on the repeater. Let's keep that up.

The League had a booth in Vegas, for some strange reason a lot of broadcast folks tend to be hams, can't understand why…Lots of people stopped by for regular ham information, one gentleman stopped by specifically for disaster contacts in his area. The folks there in the booth were able to guide him to information that will help him out.

Now, Vegas is Vegas, it's like Dayton for Broadcasters. There's always new and really neat gear. Wolf Coach a company that manufactures satellite trucks had a new Ford Expedition fitted out. It had a clam shell cover for the satellite uplink dish, the second row seating had been gutted for the equipment racks, 2 side with a lift up desk. You had to be there.

Oh! I only lost 5 bucks.

73 to all,
John Chapman
e-mail:
jlchapman2@juno.com or
kc5mib@arrl.net

ARES STUFF

The statewide simulated emergency test will kick off this week (1 May). We will be asked to participate, to pass comms between the area hospitals and very probably out of the area.

To those who have volunteered, thanks in advance. We done all of this before, we've got new methods to try and test.

Let's show them that amateurs can do a professional job.

73 de KC5MIB

VE TESTING

Our next VE testing is scheduled for Wednesday, May 17th at 7:00 p.m. in the Parish Hall of Christ Episcopal Church. Applicants should bring a picture ID, the original and a copy of their current Amateur license, the original of any CSCE's and $14 to cover the cost of the exam(s). Correct change is always very much appreciated.

CLUB NETS

Remember to join us each week for the 2-meter nets sponsored by NARC. Each MONDAY is the NARC ARES/RACES net, at 8:00 p.m. on the club's 146.84 repeater (PL 141.3). Second, on THURSDAY evenings at 8:00 p.m. is the Deep East Texas Skywarn Net on the 147.32 repeater (PL 141.3). Please join us for one or both.

NEXT MEETING

The next meeting will be on Wednesday May 3rd at 7:00 p.m. in the Parish Hall of Christ Episcopal Church. This is at the corner of Starr and Mound Streets in Nacogdoches. Hope to see y'all there.

BASIC ELECTRONICS

Part Four

By Thomas Atchison, W5TV

Recall that if we have a string of resistors, R1, R2, R3, in series, we can find a single equivalent resistor, R_T, to replace that string using the formula

$$R_T = R1 + R2 + R3.$$

Similarly, if we have a string of resistors, R1, R2, R3, in parallel, we can find a single equivalent resistor, R_T, to replace that string using the formula

$$\frac{1}{R_T} = \frac{1}{R1} + \frac{1}{R2} + \frac{1}{R3}.$$

We now consider how to use these equivalent relationships to simplify a series/parallel circuit. Consider figure 1

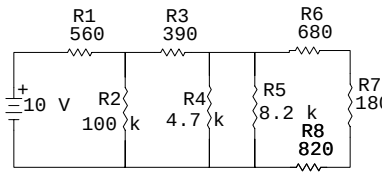

Fig. 1

We begin working at the point farthest from the voltage source. Notice that resistors R6, R7, and R8 are in series. This means we can replace them with one equivalent resistor,

$$R9 = R6 + R7 + R8.$$

The value of R9 is 1680 ohms. This leaves us with the equivalent circuit in figure 2

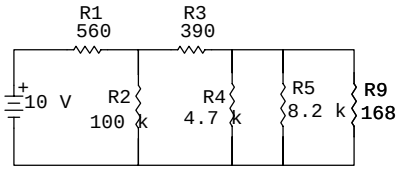

Fig. 2

In figure 2 we observe that the three resistors, R4, R5, and R9, are connected in parallel. This means we can replace them with one equivalent resistor, R10 as follows:

$$\frac{1}{R10}=\frac{1}{R4}+\frac{1}{R5}+\frac{1}{R9}.$$

The value of R10 is 1075 ohms. This leaves us with the equivalent circuit in figure 3

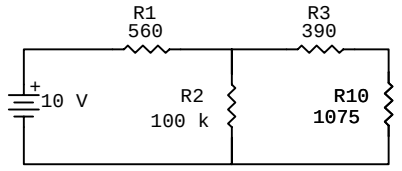

Fig. 3

In figure 3, R3 and R10 are in series, so we can replace them with an equivalent resistor, R11 having a value of 1465 ohms. This leads to the equivalent circuit in figure 4

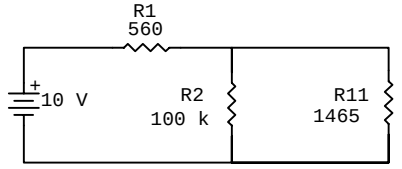

Fig 4

Now we see that R2 and R11 are in parallel so we can replace them with an equivalent resistor, R12, having a value of 1444 ohms. This leads to the circuit in figure 5

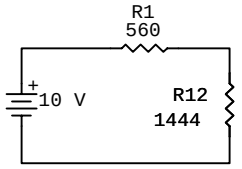

Fig 5

This is a series circuit and we can now write a final equivalent circuit shown in figure 6

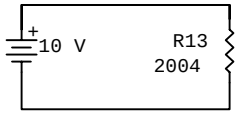

Fig 6

We may now calculate the total current that flows from the voltage supply using this equivalent resistor. Ohm's Law is used as follows:

$$I=\frac{E}{R13}=\frac{10}{2004}=4.99x10^{-3}$$

The total current is 4.99 mA.