

QUINEBAUG VALLEY ENGINEERS



The Zagray Quarterly

December 6, 2013

President's Notes

We had a pretty successful October show considering the unfavorable weather. Saturday's show had very good attendance; the Sunday turnout was pretty miserable, as was the weather.

At the October meeting, five new directors were voted in: Al Bezanson, Pete Bucci, Craig Cyr, Karl Hansen and Mark Sloan.

We succeeded in retrieving several donations:

- ⌘ From the Gardiner family, the Case 1470 (not running) was brought to the farm. The Case 1200 (running) was dropped off at Ed Bezanson's for restoration work. Several smaller donated pieces were also brought to the farm, including a very nice Delta drill press that is rigged for both normal and slow speed drilling.
- ⌘ From the Parizek family, the Atlas Imperial diesel engine was brought to the farm, along with related equipment and line shafting.

The retrievals required considerable effort. Thanks go to all those involved; the Bezansons, the Chesters, George Jarvis, Ken Avery, Rick Fillback, Ned Tewksbury, Duane McDuffee and son, and anyone else that I've failed to mention.

We will be hosting the Allis Chalmers "Gathering of The Orange" at our 2015 spring show. In preparation for that event, an effort has been initiated to spruce up the farm. Art has started a scrapping effort to get rid of unwanted old iron and a lot of needed trimming and brush cutting will also be done.

We have CHS approval to construct the woodworking shed near the saw mill that we proposed to house the planer, shingle mill(s) and other woodworking machinery. All the lumber for the shed has been cut and stored to dry for spring construction.

Tractors have been stored in the tractor shed, the water has been shut off and the farm is ready for winter.

FROM THE DESK OF THE TREASURER – Art Chester

It's that time of year again, when I make the call for next year's dues. Dues are again \$20.00 for the year and due January 1st. The mailing address is:

QVEA
180 South Plumb Road
Middletown, CT. 06457-1929

If you have an email address, please email Dianne Tewksbury at dtewks@sbcglobal.net to receive your newsletters by email rather than from snail mail! That will save our printing-sorting-folding-mailing crew some labor, and save your club a **lot** of money, as well as being environmentally 'green'.

For those of you who contribute to the United Way campaign, QVEA is now listed as a charitable organization allowing you to direct your donation to us for the support and expansion of the Zagray Farm Museum. Pfizer Foundation also has a volunteer program that provides QVEA with substantial donations each year, based on the volunteer work of members who work or are retired from Pfizer.
We appreciate all donations in any form or size.

Happening at the Farm

Allis Chalmers HD5 crawler

Our GM271 powered HD5 is back at the farm and operational. Next spring we hope to give it a new coat of paint.

Zagray Saw Mill

We began cutting for the woodworking building at the October show. The goal was to have all the material cut, stickered, and stacked under the saw mill for the winter to allow for drying and seasoning. Both the Lane mill and the Amidon portable mill were in operation at the beginning, but the Lane mill's Caterpillar engine developed trouble and was sidelined for repair. The portable mill got new injectors in its 371 Detroit power plant, and completed the task admirably. Thanks to all who were involved. We are ready to construct the woodworking building, pending town approvals.

Seven loads of pine logs were brought to the farm, with a good portion of them already cut into siding and framing. We have a good supply, but will continue to add to it when opportunities arise.

Remember that the material cut at the mill may be specific to a particular job or member. So if you need something, check with Dave @860-982-5163 so you don't inadvertently use lumber slated for another project.

If you need something cut, or can use material out of one of our excess stacks - see one of us to discuss it. I'm sure we can accommodate you.

We have lots of slab wood that needs to be put to use as firewood and some hardwood, as well as sawdust and planer shavings (makes great fire starter!) as byproducts of this demonstration area available. See any of us if you want some.

Woodworking Building

We are awaiting a change to the language of the CHS approval letter, at which point we can formally go to the Hebron Wetlands Commission and Building Department for approval. The town now has a 300' wetlands review area designation, and of course we are in it. The size of the building was changed to 20 X 48 with 4 sets of (8 X 8) doors in front, and perhaps one or two sets in the rear, to accommodate the type of millwork demonstrations this building will house. We have been given permission to remove the line shafting from the button factory in Willington in the spring, and that should help us with the needed parts for this project. We are, however, in need of a low speed, 4 cylinder diesel stationary power plant

Construction planned to begin in the spring of 2014.

P.S. QVEA received CHS's approval letter on Dec. 4th.

Murphy Diesel Power Plant

What started out as a back-up plan for the power to the Lane sawmill, George Jarvis and Bob Chester are actively involved in bringing this unit back to active duty. The motor was already on skids, so dragging it into the repair shop was relatively simple. After freeing up some shafts and other maintenance, the engine started right up and ran very well, with the exception of a low oil pressure condition. This engine uses an external, belt driven oil pump which is now at a rebuilder for repair. If that proves to be the problem, we will have direct start power for the saw mill, and the Caterpillar can be sidelined for further diagnostics and repair. Some alterations to the belting and exhaust will need to be done in the spring to complete the project. It has been good for us to get into this project and try to absorb some of George's extensive knowledge of the Murphy engine.

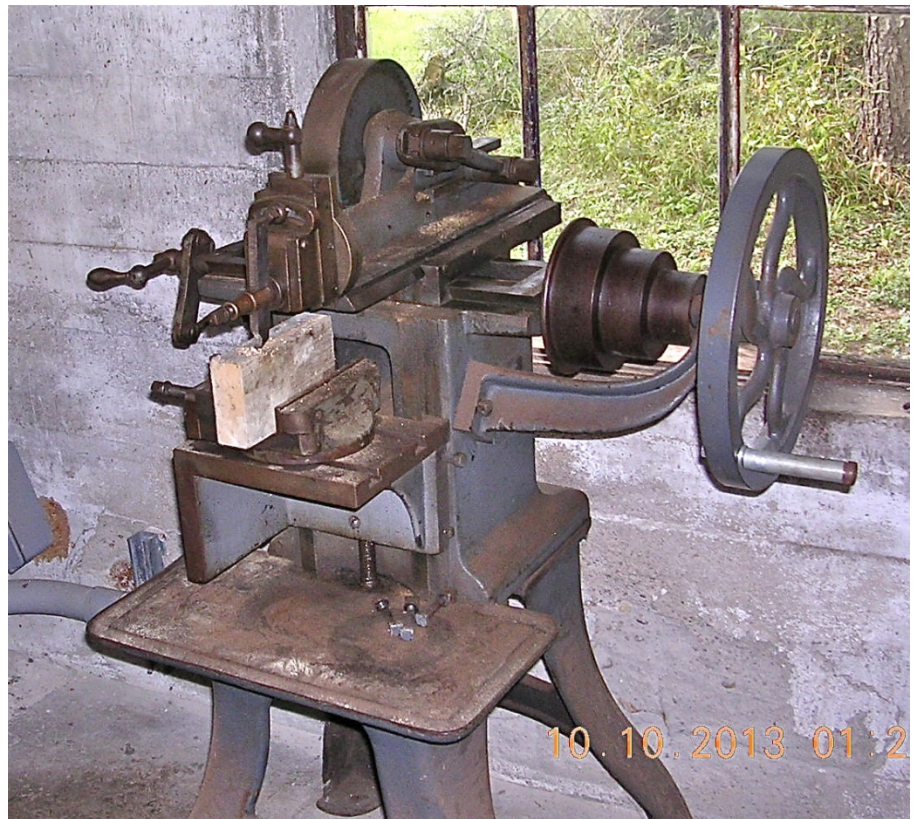
Surplus and Scrap Equipment

As part of an on-going effort at the farm, equipment is periodically re-evaluated with regard to condition, intrinsic value, suitability for use or demonstration, repair cost, and the needs of the museum. It's not scientific, but basically it means that as better equipment gets donated, some pieces in 'possible someday' or 'dead dozer drive' get re-evaluated. We have set out a substantial array of such equipment, most to be scrapped, and received offers to buy and take off-site on a couple. It's a win-win, we reduce our excess inventory and bolster our treasury, and a member gets a project. In the spring we will do the same with the accumulation of smaller items, more suitable to put in roll-offs.

New Operational Exhibit - By Dave McClary

12/13

The ca 1880 Boynton & Plummer crank operated traverse shaper pictured below was donated by a member several years ago and had been used in the Mystic Shipyard before he acquired it. As shown, it can be operated by hand or belt drive. A motor and jackshaft were attached for belt power drive but that was removed and is now used to power the line shaft in the machine shop. A traverse shaper has a ram and clapper that can be moved laterally by hand or by a stepper mechanism, moving along a bed similar to a carriage on a lathe. The piece being shaped is held stationary in a vise. To explain how it operates, the flywheel and hand crank shaft extends the length of the bed and has a key slot the entire length inside the bed ends. A spur gear is keyed to that shaft and is free to slide. It is captured by two washers on a mating idler gear attached to the ram carriage, which gear in turn meshes with the large visible crank gear that drives the ram. The slot on the crank has a "T" bolt for attaching a crank rod and is used for



stroke adjustment. The other end of the rod is bolted to the ram. As the crank rotates it gives the ram a reciprocating motion. At the left end of the main shaft another spur gear engages a gear on a stub shaft which turns at the same speed as the main shaft. That gear has a slot and "T" bolt for attaching a stroke rod. That rod provides a reciprocating motion to a lever keyed to a threaded shaft located along side the main shaft inside the bed. The lever motion is synchronized with the motion of the ram for stepping purposes. The shaft has an acme type thread the full length that engages a "nut" attached to the ram carriage, giving it the lateral motion for stepping. A ratchet device can engage the reciprocating lever to the shaft, and can be set for stepping in either direction, or it can be disengaged for hand adjustment of the lateral position of the ram. The tool holder and clapper can be adjusted vertically and rotated on an indexed plate for positioning the cutting tool. The vise can also be rotated and the support table can be adjusted vertically as necessary for the piece being machined. The shaper has been shifted in location with the turret lathe so that the crank is easily accessible. This is a machine that a youngster can operate during shows and see the resulting cutting action.

The unfinished work of replacing the pinion gear and the clapper adjusting screw nut on the Robbins and Lawrence iron planer remains in progress. The replacement gear casting was obtained from the foundry just before the Fall show. Boring the hole to fit the slight taper on the shaft has been completed and the key slot made. After some preliminary smoothing of the teeth, the gear was put on the shaft hand tight and the shaft installed on the planer with the table lifted off the bull gear. This was done to check for proper gear meshing. That was not right and some further shaping of the teeth is required. This was expected as both gears were worn providing little guidance when making a wooden pattern. At that time there was no standard for gear tooth shape.

FROM THE SECRETARY

The December 31st meeting on New Year's Eve has been cancelled.

Show Dates for 2014: May 3-4, July 19-20, Oct. 4-5

Please visit the club's web site at www.qvea.org for club officer contact information, copies of the quarterly newsletters, show dates, photos, videos, etc.

Dianne Tewksbury
QVEA Secretary & Editor
90 Park Road
Colchester, CT 06415

APPLICATION FOR MEMBERSHIP

QUINEBAUG VALLEY ENGINEERS ASSOCIATION, INC. (QVEA)



NAME _____

STREET _____

CITY _____

STATE/ZIP _____

PHONE _____

E-MAIL _____

Dues are \$20.00 per person for one year, payable with application.
Dues include liability insurance at the farm.

RETURN TO: QVEA, 180 SOUTH PLUMB RD, MIDDLETOWN, CT 06457