



The Line Shaft

The Official Newsletter of the

NORTH JERSEY ANTIQUE ENGINE & MACHINE CLUB

VOLUME #32

ISSUE #3

President: Blace Flatt
(973) 663-1090

Vice Pres.: Andrew Mackey
(973) 627-2392

FOUNDED ON OCTOBER 15, 1979 BY:
*Arthur Goble, Fred W. Westbrook, John Snook,
Roy Bischoff & Lewis Quince*

Newsletter Editor: Richard Magera
(973) 948-6625

Treasurer: Eric Hayes
(973) 670-2956

Secretary: Jeff Brooks
(973) 570-2749

Our February 10th 2011 meeting was held in the conference room of the Sussex County Fair Grounds Administration Building. The officers attending included Blace, Andy and Jeff; with Eric unable to attend due to a traffic jam on Route 80.

We are continuing our request for members to dig into their closets for an unused "digital" cam recorder that could be contributed to the club. Per our audio visual guy, Dave Betts, moving from an analog to a digital camera is a major step forward and, as we want to chronicle certain club events and/or some rebuilding projects, it is considered critical. Also, we would like to produce training films (DVD's) of the start-up and run procedures of the many engines in the shed. Our hope will be to get a larger "show-and-tell" member group to cover the *State Fair* and the other events that require these engines to be run. The other possibility is to "screen" these same films at the shed and during events to educate and inform the public to the idiosyncrasy of these ancient engines.



As part of the clubs continuing effort to return the *hit-and-miss engine* to club prominence...Andy Mackey brought a UNITED ENGINE COMPANY, 1 1/2 hp ENGINE to the meeting and gave a presentation on. Pictures and a short write-up on the engine and presentation is on page 2 of the newsletter.

Blace discussed possible remembrances for our recently deceased members and Dave Betts will be updating the commemorative plaque in the engine shed. There may be future discussions on this topic.

Tea, coffee and donuts were provided by AnneMarie Adams and John Salvagno won the 50/50.

Our next meeting will be on **Thursday, March 10th 2011** at 7:00 PM in the conference room of the *Sussex County Fairgrounds* Administration building. Kevin Adams our resident machinist will be presenting one or possibly several films on the *South Bend Lathe* and Andy Mackey will lead a discussion on the *Maytag 2-cycle engine*.

North Jersey Antique Engine & Machine Club

**VINTAGE TRACTOR
PLOW DAY**



March 26th, 2011

at

Ideal Farms, Lafayette, NJ

**NOTICE: Fire extinguishers will be required on all machinery.
NO EXTINGUISHER, NO PLOWING!**

PLEASE CHECK THE ADDRESS LABEL ON YOUR NEWSLETTER FOR MEMBERSHIP EXPIRATION!

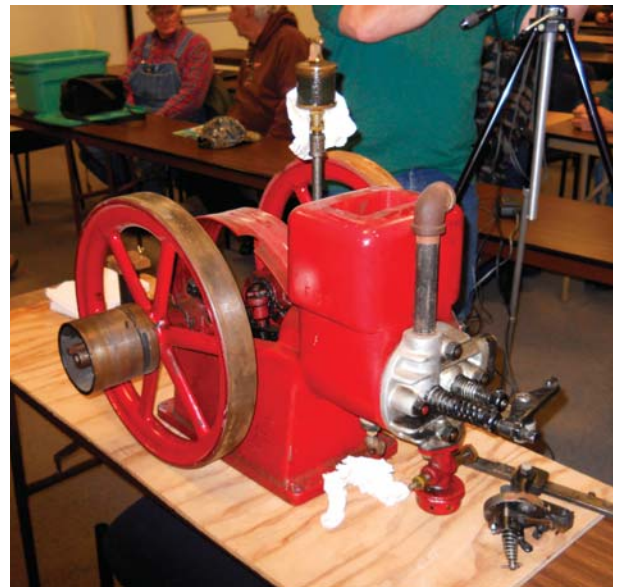
(The month listed will be the date when you membership dues are to be paid
or this will be your last newsletter)

Dues are \$15 per year and, checks payable to NJAE&MC



Four Cycle Hit-and-Miss Engine

As a 2nd in a series...Andy Mackey, club VP, put on a presentation on the club owned UNITED hit-and-miss engine. The UNITED, 1 1/2 HP, 4-cycle (Otto cycle) hit-and-miss engine...circa 1918...was manufactured in the early part of the 20th century by the UNITED ENGINE COMPANY of Lansing, Michigan. Of note; UNITED was an actual engine-builder and not a re-brand. These smaller engines were used to power butter churns, milking machines and grinders in the farming community and were very "fuel stingy" and efficient vs. their conventional *throttle-governed* cousins. On the down side... both large and small hit-and-miss engines have a wide fluctuation in engine speed and cannot be used to power generators or any machine or equipment that requires constant speed. The UNITED engine has a battery/coil fired make-and-break ignition vs. the low-tension magneto excited ignition, an ignitor vs. a sparkplug, a fuel mixer vs. a carburetor...and, as with all hit-and-miss engines, uses the inertia of its flywheels to do most of the work. These are heavy, simple engines, with an "open" crankcase design and with all the components of the engine visible and "exposed" to the elements...and dirt! The most intricate (technical) part of the engine is the "trip-rod", which connects to a fly-ball/spring governor and controls to both the ignitor and the exhaust valve...which it holds open (the "miss") whenever the engine is operating above its governed speed and thereby interrupts (stops) compression, vacuum and fuel intake. Cylinder lubrication is provided by an adjustable open-air or pressurized single-point drip lubricator and the balance of the engine is lubed by hand with either oil or grease. Lack of lubrication is a major problem with these engines and Andy strongly recommended pre-lubing the piston and wrist pin, connecting rod, crankshaft and all operating mechanisms prior to starting the engine. Andy also advised not running these engines too slow...always a concern in a display engine. At very low RPMs, the torsional vibration and piston-rod-crankshaft impact can damage, crack or break the crankshaft. While giving his presentation, Andy noticed and noted several problems with our UNITED engine that will have to be addressed in the near future. Dave Betts used his newly acquired non-digital (old fashion) analog camcorder system to project Andy's presentation visually and real-time on a movie screen.



in



WELCOME
New Member

BOB DRAGHI
Stillwater, NJ

Clay Squire

1987 Ford 4-Wheel-Drive Ranger Off-Road Rock-Truck!

Although this is not an antique, all of our members have “other” interests and hobbies. One of Clay’s other hobbies is modifying trucks, lawn and garden equipment and other pieces of machinery into products the Original Equipment Manufacturer never envisioned.

This is a partially finished project, but has already moved dirt.



As you will note this is a somewhat dated article . . . we will try to get a newer picture for future newsletters!



Modifications to date, 5/09:

- A fabricated square nose, and flat hood.
- A fabricated low profile articulated-haul-truck style body.
- Helper springs and air shocks.
- A Meyers Snow Plow and mount.
- An external air filter.
- Wal-Mart “round” headlights (\$10.00 ea.) that are failing from a poor chrome job (would we expect anything different) and will require future replacement.
- 16” tractor tires with the rims modified from 6 lugs to the Ford 5 lug design.
- An electric-over-hydraulic pump and hoist cylinder arrangement pirated from a commercial hydraulic tail gate.

Future plans include:

- A set of fabricated “flat” panel doors.
- A head-ache guard.
- A complete “blah” black re-paint...we were hoping for Euclid “pistachio” green, but Clay seems adamant. We will continue to work on him...maybe we could bring it up to vote?

**We need a “head count” for the upcoming Military Vehicle Show.
Count will determine entry passes. Sign-up with Blace or Jeff at the next meeting**

MARKETPLACE

WANTED: 14.9 x 24 used tire **CONTACT:** Ken Reuter, 973-670-1646

FOR SALE: International Cub Cadet 102; repainted, just needs wire harness. \$400 **CONTACT:** Paul Curcio, 33 Central School Rd., Wantage NJ 07461, 201-835-5924, PaulF350@yahoo.com

WANTED: Backhoes-Compact Tractors-Mini Excavators-Skid Steer Loaders-Cletrac & Oliver Crawlers-Farm Tractors-Small Dozers... in any condition. "Top \$ Paid" **CONTACT:** Robert Norman, 845-858-8242

WANTED: 3-Point hitch conversion for Farmall "H"

CONTACT: Rich Magera, 973-948-6625

FOR SALE: Steam bent ash hardwood walking plow handles; high quality straight grain. \$30 per pair.

CONTACT: Bruce Mitchell, 973-702-1012

FOR SALE: Premier Designs jewelry or host jewelry trunk show. Donations to NJAE&MC from sales.

CONTACT: AnnMarie Adams, 973-946-1726, AnnMarieBADams@aol.com

WANTED: Old, odd or unusual spark plugs wanted by collector. Will buy or trade.

CONTACT: Joe Cook, 66 Central School Road, Wantage, NJ 07461 Phone: 973-973-875-9733 E-Mail: joe.ignitor@gmail.com

WANTED: Good hood & good fenders for Ford 8N (I have bent ones)

CONTACT: Jim Dunlap, 973-219-9694

For Sale: 2 ea 950-24 tractor tires on Farmall rims. Fair condition. \$100.

CONTACT: Nick Feenstra, 973-875-3467

FOR SALE: 2 ea. 154 International Harvester Low Boys; one ran 3 yrs ago when shut down, under tarp, has Woods 59 inch belly mower. 2nd tractor running, needs brake work, has rear mount 3 point hitch with hammer type mower attachment. Both with long personal ownership. For sale or trade for older Cub Low Boy with plow and/or attachments, or 8/9N Ford.

CONTACT: Charles Germershausen at cgermershausen@hotmail.com or call cell 1-973-214-5968. Tractors located in Florham Park, NJ.

WANTED: Spare parts for 1917 Fairbank/Morse hit & miss engine. Ford Golden Jubilee steering wheel **CONTACT:** Charles Germershausen at cgermershausen@hotmail.com or call cell 1-973-214-5968.

For Sale: 2 Goodyear 16.9 x 24 6 ply Industrial Sure Grip Tractor/Backhoe tires. Approx 40% tread. Good condition, great for spares. (These tires are \$800 each when new) Asking \$125 each or willing to trade for decent 11.2 x 28 tractor tires for Ford 2N. **CONTACT:** John at 973-919-0369

WANTED: Parts for International M Hit or Miss Engine. Piston, sleeve, etc. needed, all parts considered. **CONTACT:** John at 973-919-0369

LOCAL EVENTS & SHOWS

NJAE&MC PLOW DAY, March 26, 2011

Ideal Farms, Lafayette, NJ

MILITARY TRANSPORT ASSOCIATION 10TH ANNUAL SPRING SWAP MEET & MILITARY VEHICLE SHOW

April 16 & 17, 2011

www.mtaofnj.org Sussex County Fairgrounds, Augusta, NJ

HUDSON VALLEY OLD TIME POWER ASSOC., INC.

Fingar Road, Hudson, NY

2nd Saturday of May, 2011, Annual Commission Auction

www.northerndutchess.com/hv-oldtimepower.htm

BLUE MT. ANTIQUE GAS & STEAM ENGINE ASSOC.

Jacktown Grove, Bangor, PA

May 21 & 22, 2011 25th Annual Swap Meet & Flea Market

Free admission and parking. For more information

610-588-6900 www.jacktown.com

ROUGH AND TUMBLE ENGINEERS HISTORICAL SOCIETY

US Route 30, Lancaster PA

http://www.roughandtumble.org/rt_visit_sched.asp

April 22, 2011 Spring Antique Tractor Pull

May 13&14, 2011 Spring Steam-Up

May 27&28, 2011 IH Collectors Spring Show

June 10&11, 2011 Blacksmith Days

July 22&23, 2011 John Deere Show

COOLSPRING POWER MUSEUM, Coolspring, PA

June 16, 17 & 18, 2011

Summer Expo & Flea Market (featuring New York Engines)

<http://www.coolspringpowermuseum.org>

HUDSON-MOHAWK CHAPTER OF THE PIONEER GAS ENGINE ASSOCIATION, Schoharie, NY

June 11&12, 2011 44th Annual Gas-Up

For more information Doug Gallup 518-872-0564

www.gasup.org or e-mail Howardsquire@aol.com for information

LONG ISLAND ANTIQUE POWER ASSOCIATION

Jamesport, NY www.liapa.com

July 16&17, 2011 19th Annual Summer Show

Quincey Compressor Update

- Hauled to Jeff Brook's shop
- Disassembled and inspected
- Club approved partial parts cost, not pistons
- Parts ordered
- Refurbishment "in process" with a combination of new and old parts . . .
- The big question remains.

How much air will it make?

