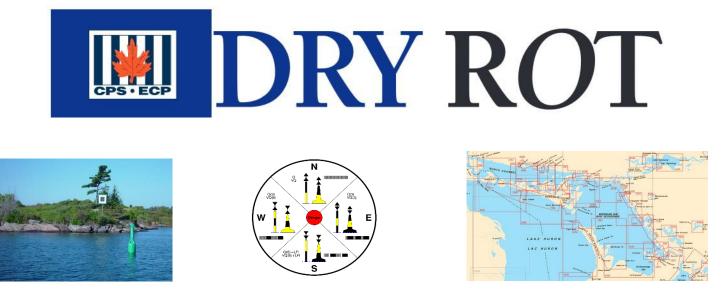
January 2019



# INTRODUCTION TO NAVIGATION REGISTER NOW

Do you want to learn how to use those complicated looking marine charts?

## **COURSE TUITION**

- If you took Beyond the PCOC / Boating 2 \$120.00
- New student, materials must be ordered \$145.00

## MACASSA BAY YACHT CLUB

80 Harbour Front Drive, Hamilton

March 7, 2019 to April 4, 2019 REGISTER BEFORE FEBRUARY 28TH

Time: 7:00 p.m. – 9:00 p.m. тн.

THURSDAY NIGHTS

To Register Contact: Roger Pimm: 905-308-0060

OR rogerpimm70@gmail.com



**Courses Starting Soon** 

### Harry Benjamin Greening

#### Powerboat Racer Extraordinaire

- Harry Greening was born in Hamilton in 1880. His father, Samuel Owen Greening, was a founding member of RHYC in 1888 and was part owner with Francis Kilvert and the Grant family of RHYC's first flag ship, the cutter *Phyche*.
- The family business was B. Greening Wire Co. Ltd. founded by Harry's grandfather in 1859. Located in downtown Hamilton, the plant occupied the full block at Queen and Napier Streets, between York and King.
- Harry was educated in Ridley College in St. Catherines and started his boat racing career at the age of 24.
- Needless to say, Harry Greening had the financial resources to apply his exceptional engineering expertise to the sport he loved most the rapid development of powerboat racing in the early days of planing hulls and the internal combustion engine.
- In 1904 he used a foot powered lathe to make his own 3 hp motor in his attic. This engine drove a canoe at 9 mph and attracted the attention of the aviation pioneer, Glenn Curtis, who purchased the design after sending his representative, Casey Baldwin, to Hamilton to inspect the design.
- In 1908 Harry had American yacht designer Bill Luders design *Gadfly I*, powered by a 10 hp Buick automobile engine which drove the boat across Hamilton Harbour at 15 mph.
- Gadfly II pushed the speed up to 22 mph with a 24 hp engine.
- Canadian yacht designer, Bing Benson of Toronto, designed and John Morris of Hamilton built *Gadfly III*. Equipped with a 135 hp Niagara six cylinder engine, she topped out at 29 mph.
- The vee bottom *Gadfly IV* was designed by George Crouch and built in 1918. Although the boat could reach 30 mph, she was not used often for racing but fulfilled Greening's premise that all boats should be equipped with leather seats and carry passengers!
- In 1920 Greening commissioned Crouch to design and had Herb Ditchburn of Gravenhurst build *Rainbow I*. With her, Harry competed for the Fisher Trophy in Miami, which involved a three day series of races with no adjustments or repairs being allowed between races. The premium was on endurance and reliability, the latter being a real problem with racing powerboats of this era. To optimize performance Greening was one of the first to have his engine's crank shaft dynamically balanced and the first to install aluminum pistons, the largest built to date. These modifications boosted the output of the 300 hp Sterling engine enough that he obliterated the field of competitors in all three heats and was dubbed the "best powerboat ever built". She was displayed at the 1920 New York Boat Show at the Sterling engine booth. Greening was now committed to technological improvements as his key to racing success.

- With *Rainbow II*, incorporating input from Albert Hickman (developer of the Sea Sled) and yacht designer Bill Tripp, Greening experimented with surface piercing propellers and after working the bugs out, produced a boat that could do 60 mph, seeming to ride above the water. At her debut racing in Buffalo she suffered serious structural damage, sinking when her bottom planking was shattered by wave impacts. Ironically, despite being refloated and rebuilt within 48 hours, all three heats were won by Greening's former *Rainbow I*, now under new ownership.
- In 1922 Greening built *Rainbow III* for the 1923 Gold Cup racing in Detroit. She was a John Hacker design built by Ditchburn with a new Packard engine. With this boat, Greening perfected the surface piercing propeller mounted aft of the transom supported on an outboard mounted rudder. *Rainbow III* easily won the first two of the three heats, but failed to finish the last race due to a cotter pin failure in her propeller! Despite winning two of the three races, she finished last on accumulated times. Later Harry learned that he would have had enough time to jump overboard and pull Rainbow for the last fifty feet over the finish line and still win the overall standing. As recognition of his performance, one of his admirers sent him a golden cotter pin with a set- in diamond to be used as a tie clip.
- Shipping *Rainbow III* back to Muskoka, Greening laid out a 19 mile course on Lake Rousseau in order to beat the 24 hour speed record. In the 24 hours, *Rainbow III* ran 1,064 miles, shattering the ocean liner *Mauretania's* noon to noon previous record of 760 miles. She averaged 44.3 mph even with refueling times included.
- In 1924 Greening returned to Detroit for the Gold Cup racing with *Rainbow IV*. Taking advantage of the legality of clinker built boats in the series, Greening and Ditchburn ran the lapstrake planking diagonally across the bottom, essentially creating a series of 1" steps. Stepped hulls were illegal in Gold Cup racing, but Greening had invited the APBA inspectors to come to Gravenhurst to approve construction, which they did. *Rainbow IV* easily won the 1924 Gold Cup racing in Detroit, but a subsequent protest of her bottom configuration was upheld and the trophy was withdrawn by the APBA, despite their inspector having previously approved the boat.
- *Rainbow IV* then reset the 24 hour speed record back in Muskoka, running at an average speed of 50.8 mph for the 1,218.8 miles.
- Greening then turned his attention to designing and building *Rainbow V* to win the Duke of York Trophy raced on the Thames River in England. This was a much smaller 22' boat because of the limitation on the 91.5 cu. inches of the engine. Greening utilized an
- eight cylinder engine turning at 8,000 rpms and producing 200 hp. However, with the Thames in flood, racing conditions were terrible. There was so much debris floating on the river that only one boat finished, and it wasn't *Rainbow V*.
- *Rainbow VI* was built for a development class in Detroit, but was not successful. Designed to reach 80 mph, she only attained 60. Greening dismissed her as "the less said the better!".
- *Rainbow VII* was the culmination of everything learned on Rainbow II and IV. She was 38' long with 9' beam, and carried two 600 hp Liberty aircraft engines. She could carry 15

passengers and do 60 mph. Carrying eight passengers, *Rainbow VII* was the boat in which Greening won the Lipton Cup in 1928 in Detroit. She beat all competitors in each of the three heats to win the North American Powerboat Championship. Greening used *Rainbow VI* to set another endurance record of 723.9 miles in 12 hours at an average speed of 63.2 mph including fueling.

- In all his racing, Greening was not only focusing on speed but also on comfort and reliability, features he considered equally important.
- Greening retired from racing in 1929 but continued to build boats for his personal use.
- *Rainbow VIII* was a raised deck cruiser for pleasure use on the bay and beyond. She was designed and built by Billy Burnside in Hamilton. Billy Burnside raced against AEmilius Jarvis, and modified the deck of *Vreda* for Norm Robertson.
- Greening launched *Rainbow IX* at RHYC in 1934. With a 12 cylinder 550 hp Packard/Liberty engine, she could do 63 mph. She was intended to beat the North American speed record of 73 mph but it never happened.
- Although retired from racing, he continued to serve on the APBA (American Power Boat Association), the Canadian Boating Association and RHYC. Greening was Commodore of RHYC from 1922 to 1924, in the midst of racing *Rainbow III* and *Rainbow IV*.
- His fascination with all things mechanical also drew him to early automobiles. He and his father were two of the founding members of the Hamilton Automobile Club in 1903. His father was elected the HAC's first President. The HAC is the oldest automobile club in Canada.
- Greening was honoured by the American Power Boating Association in 1953 as one of the top 10 pioneers contributing most to powerboat racing over the last 50 years.
- *Rainbow I* has been painstakingly recreated by owner Rolf Gerling, builder Gary Clark with the design input of Steve Killing, based on a half model and launched in 2009.
- The original *Rainbow III* has been restored, granddaughter Vicky and other members of the Greening family had ridden in her on Lake Muskoka in 2000.
- In 2003 Harry was inducted into the Canadian Motorsports Hall of Fame as a significant contributor in Powerboat Racing.
- Therefore, based on Harry Greening's contribution to and accomplishments in the early history of powerboat racing in Canada and internationally, it is more than appropriate that as a member and past Commodore of RHYC, he be inducted into the RHYC Hall of Fame.

Write up contributed by Tom Dunmore

#### **2019 Courses and Events**

Introduction to Navigation, March 7th to April 4th

VHF Marine Radio Course (Restricted Operator's Certificate) April 18th and April 25th

Annual Spring Breakfast, April 28<sup>th</sup>

Annual General Meeting, April 28th (after breakfast)

Dry Rot Assembled by Ronald Warby, <u>AP</u> Dry Rot Distributed by Peter Boothroyd, <u>AP</u> Dry Rot Contributor Tom Dunmore