

GENEALOGY OF THE MACHINE INDUSTRIES OF WINDSOR, VERMONT

Compiled by Guy Hubbard, Windsor Vt, 1922

SOURCES

As name WINDSOR indicates, many of the early settlers were CONNECTICUT YANKEES from the HARTFORD DISTRICT.

TINMOUTH IRON WORKS (Near Rutland, Vt), 1785-1870

WINDSOR & PLYMOUTH ASCUTNEY IRON CO, 1836-1872

Tyson's Furnace, Plymouth, Vt.
Builder and Proprietor
Isaac Tyson, Jr. (Well known Baltimore Chemist and Manager of Coppers Works at Stratford, Vt)
Francis Draper Superintendent of Furnace

DEWITT CLINTON was Governor of New York and builder of the Erie Canal. He came to Windsor, Vt. in 1827 to assist in the Connecticut River Project, and at that time became interested in the Rotary Pump.

CAPTAIN SAMUEL MOREY, born at Hebron, Conn., in 1762, built and operated on the Connecticut River near Fairlee, Vt., a successful Steamboat in 1793.

THOMAS BLANCHARD, born at Sutton, Mass., in 1788, was inventor of Gunstock Lathe. In 1829, he built at Springfield, Mass., the steamboat "Vernon" and in the fall of that year navigated it from Hartford, Conn., to Windsor, Vt., for the Conn. River Valley Steamboat Co.

JOHN M. COOPER was an inventor from Guildhall, Vt.

ASAHEL HUBBARD, born at Meriden, Conn., in 1787, came to Windsor, Vt. in 1800 and learned trade there.

JABEZ PROCTOR was a Mill Owner of Proctorsville, Vt.

NICANOR, KENDALL, born at West Windsor, Vt., in 1807, learned trade of Gunsmith there in a shop of Asa Story. Kendall was a son-in-law of Asahel Hubbard.

COLMAN S. HUBBARD, son of Asahel Hubbard, learned his trade under his father and Nicanor Kendall.

CARLOS COOLIDGE, born at Windsor, Vt., in 1792, graduated at Middlebury College and became a Windsor lawyer.

RICHARD S. LAWRENCE, born at Chester, Vt., in 1817, learned Machinist and Gunsmith trades at North Waterstown, N.Y. Came to Windsor, Vt. in 1838.

BENJAMIN TYLER HENRY, born at Claremont, N.H., in 1821, learned trade there at shop of J. B. Ripley & Co.

SAMUEL E. ROBBINS, born at Boston, in 1810, was a wealthy Lumber Merchant of Boston and Bangor, Maine.

SEWEL F. BELKNAP, born on farm near West Dummerston, Vt., in 1812, rose from laborer to Railway Contractor, and before death at thirty-six built Boston, Portsmouth & Saeco, Fitchburg, and Central Vermont Railways.

WARREN CURRIER, born at Walpole, N.H., in 1817, studied Law at Windsor, Vt., and became an attorney there.

LEMUEL HEDGE, born at Windsor, Vt., in 1786, became a Cabinet Maker and Mechanic there. Invented Paper Ruling Machine, 1817; Engine for Dividing Scales, 1827.

COURTLANDT C. PALMER, born at Stonington, Conn., in 1800, was a leading New York Hardware Merchant and backer of the inventors Walter Hunt and Louis Jennings.

CHRISTIAN SHARPS, born at Washington, N.J., in 1811, learned Gunsmith trade in local shops. He invented his famous Breech Loading Rifle at Cincinnati, in 1848, conceiving his idea from the Hall Breech loader of 1811.

FREDERICK W. HOWE, born at Danvers, Mass., in 1822, learned Machine Design and Construction under Zeba Gay of SILVER & GAY COMPANY, North Chelmsford, Mass.

HENRY D. STONE, born at Plainfield, N.H., in 1815, learned trade of Patternmaker at Woodstock, Vermont.

DANIEL B. WESSON, born at Worcester, Mass., in 1825, was Gunsmith and Inventor for George Leonard, Jr., of Shrewsbury, Mass., maker of Revolving Hammer Pistols.

EDWIN CLARK, was from Grover & Baker Sewing Machine Co.

GEORGE A. FAIRFIELD, born at Lansingburg, N.Y., in 1834, learned Machinist's trade under Lucius and Ira Dimmock, builders of Textile Machinery at Northampton, Mass.

CHARLES E. BILLINGS, born at Weathersfield, Vt., in 1835, learned Blacksmithing under his father at Windsor, Vt.

GEORGE W. HUBBARD, nephew of Asahel Hubbard, was born at Windsor, Vt., in 1836, and studied Engineering at Norwich University, Norwich, Vermont.

LAMSON & GOODNOW CUTLERY WORKS, 1842
Shelburne Falls, Mass.

Ebenezer G. Lamson Founder and President (Mr. E. G. Lamson was born at Sterling, Mass., in 1814.)
Abel F. Goodnow Treasurer
B. Buchanan Yale Sales Agent

EASTBURNE E. LAMSON, born at Shelburne Falls, Mass., in 1843, was a student at Brown University.

LIEUT. RALPH H. LAMSON, nephew of E. G. Lamson, was an officer in United States Navy during Civil War.

GENERAL HIRAM BERDAN, born at Phelps, N.Y., in 1824, was a well-known Mechanical Engineer and was Commander of famous Berdan Sharpshooters from 1861 to 1864.

ALBERT BALL, born at Boylston, Mass., in 1835, learned trade under WOOD & LIGHT, and WILLIAMS & RICH, of Worcester, Mass. Contractor with L. W. Pond, 1861-63.

WILLIAM PALMER, brother of Courtlandt C. Palmer, was a successful Firearms Inventor of New York City.

ROGER W. LOVE, born at Providence, R.I., in 1842, was graduate of Brown University, and Artillery Officer.

DENIS LANE was a Plainfield, Vt. mechanic.

QUIMBY S. BACKUS learned trade under BAXTER D. WHITNEY of Winchendon, Massachusetts.

DAVID A. MOORE was a ROBBINS & LAWRENCE apprentice.

FREDERICK E. WELLS, born at Buckland, Mass., in 1844, was apprentice under E. G. LAMSON at Shelburne Falls.

GEORGE H. COATES was born at Windsor, Vt., in 1849.

EBEN STOCKER was born at Hartland, Vt., in 1846.

LUTHER HAWLEY was born at Windsor, Vt.

HENRY D. LAWRENCE, cousin of Richard S. Lawrence, was born at Windsor, Vt., in 1851. Graduated at Dartmouth.

RUSSELL L. JONES, born at Deerfield, Mass., in 1824, was owner of cotton mills at Coltain, Mass.

CHARLES JEWETT JONES was son and partner of above.

W. D. WOOLSON was cler in First National Bank of Springfield, Vt. Came to J. & L. Co. at Windsor in 1888.

MACK P. MOWER was a Windsor, Vermont, schoolboy

JAMES HARTNESS, born at Schenectady, N.Y., in 1861, learned trade at YOUNGLOVE, MASSEY & CO. and UNION STEEL SCREW WORKS at Cleveland. Later worked for UNION HARDWARE CO. of Torrington, and PRATT & WHITNEY superintendent of J. & L., 1889.

GILBERT A. DAVIS was a Windsor lawyer born in Chester.

MAXWELL EVARTS, born in New York in 1862, youngest son of Secretary of State Wm. M. Everts, a native of Windsor. General Counsel of Southern Pacific R.R. and an associate of E. H. Harriman.

GEORGE O. GRIDLEY, born at Harvinton, Conn., in 1869, learned trade at WATERBURY BUTTON COMPANY, and came from Waterbury to Vermont with James Hartness.

FRANK L. CONE, born on a farm in Weathersfield, Vt., in 1868, learned trades of carpenter and patternmaker.

CHARLES A. MOORE, born at West Sparta, N.Y., in 1845, was Founder and President of MANNING, MAXWELL & MOORE.

R.P. SCHWERIN was an official of the Pacific Mail & Steamship Co. and an associate of Mr. Maxwell Everts

POTTER & JOHNSTON MACHINE CO., 1898
Pawtucket, R. I.

James C. Potter President and Engineer
John Johnston Vice President

NEAL W. FOSTER, born at Chester, Vt. in 1884 learned machinist trade at WINDSOR MACHINE COMPANY Later became Secretary to Mr. George O. Gridley.

DANIEL H. PARKER, born at Gardner, Mass., in 1882, was draftsman for BAXTER D. WHITNEY & SON, Winchendon.

STANDARD MFG. CO., HAKEWESSELL & HENN
1888-1898. Hartford, Conn.
Spencer Coil Feed Automatic Screw Machines.

Christopher M. Spencer Inventor
Edwin C. Henn Machinist and Contractor.
Reinhold Hakewessell Draftsman and Toolmaker

THE ACME MACHINE SCREW COMPANY 1898-1902
Hartford, Conn.

Acme Automatic Screw Machines—Special Products
A. W. Henn Organizer and Secretary
Edwin C. Henn Superintendent and Inventor
Reinhold Hakewessell Inventor and Vice-President

THE NATIONAL MANUFACTURING COMPANY, 1898-1902. (Offshoot from National Screw & Tack Co.) Cleveland

Standard Products from Acme Automatics
W. D. B. Alexander Organizer and President
Orin S. Wertz Secretary

THE NATIONAL ACME MANUFACTURING COMPANY
1902-1916. Cleveland-Montreal.

Acme Automatics—Auxiliaries and Products,
W. P. B. Alexander President
Orin S. Wertz Treasurer (Died in 1909)
A. W. Henn Secretary.
Edwin C. Henn Superintendent and Engineer
(Note: Mr. Hakewessell lived in 1902 and with C. M. Spencer developed the Universal Automatic)

THE NATIONAL ACME COMPANY, 1916-
Cleveland—Montreal—Windsor, Vt.

Automatic Screw Machines—Auxiliary Machines—Opening Dies—Collapsing Taps—Sawto Products.
A. W. Henn President
Edwin C. Henn Vice-President and Engineer
Oliver L. Henn Demonstrator and Salesman

DESCENT LINE OF THE WINDSOR INDUSTRIES

YANKEE INGENUITY-NATIVE BORN-WATERPOWER PATENTS

By Inclination and of Necessity many of the early inhabitants of Windsor became Millwrights, Gunsmiths and Inventors. From Vermont Timber and their Native Iron, with the help of ample Water Power, and under the protection of the United States Patents, these men, more than a century ago, began to manufacture in quantities their novel and practical Devices. In an attempt to solve their Transportation Problem, and to more fully develop their Water Powers, they organized:

THE CONNECTICUT RIVER COMPANY, 1824-1828.

THE CONN. RIVER VALLEY STEAMBOAT CO., 1828-1832
Canalization of River—Development of Steamboats

Gov. DeWitt Clinton Promoter and Advisor
Capt. Samuel Morey Canal Engineer
Thomas Blanchard Steamboat Builder and Pilot

THE ASCUTNEY MILL DAM COMPANY, 1833-
Construction of Stone Dams on Mill Brook.
The following Chain of Industries resulted:

THE AMERICAN HYDRAULIC COMPANY, 1828-1829.

THE NATIONAL HYDRAULIC COMPANY, 1829-1839
Rotary Pumps and Fire Engines—Underhammer Guns

John M. Cooper Inventor of Rotative Piston
Asahel Hubbard Inventor of Rotary Pump
Jabez Proctor Financial Backer and Manager
Nicanor Kendall Gunsmith and Inventor
Colman S. Hubbard Machinist and Gunsmith
Gov. DeWitt Clinton Promoter of Rotary Pump
Carlos Coolidge Patent Attorney

N. KENDALL & COMPANY, 1839-1843
KENDALL & LAWRENCE, 1843-1844
Hubbard's Rotary Pumps—Kendall's Underhammer Guns

Nicanor Kendall Gunsmith and Proprietor
Richard S. Lawrence Gunsmith and Designer
Benjamin Tyler Henry Gunsmith and Inventor

ROBBINS, KENDALL & LAWRENCE, 1844-1840

THE WINDSOR CAR & RIFLE COMPANY, 1849-1850

THE ROBBINS & LAWRENCE COMPANY, 1850-1856

THE VERMONT ARMS COMPANY, 1856-1858
"Windsor" U. S. Rifles—Railway Cars—Sharps Rifles—Jennings Repeating Rifles—Revolving Hammer Pistols—British Enfield Rifles—Gun Machinery and Machine Tools—Single and Double Thread Sewing Machines

Samuel E. Robbins Manager and President, 1844-56
Nicanor Kendall Superintendent (Retired in 1849)
Richard S. Lawrence Mechanical Engineer, 1844-56
Sevel S. Belknap Silent Partner (Died in 1849)
Warren Currier Incorporator and President
Lemuel Hedge Inventor of Band Saw in 1849
Courtlandt C. Palmer Promoter of Jennings Rifle
Christian Sharps Inventor of Sharps Rifle
Frederick W. Howe Designer and Superintendent
Henry D. Stone Superintendent and Inventor
Benjamin Tyler Henry Gunsmith and Inventor
Daniel B. Wesson Expert on Revolving Pistol
Francis Draper Superintendent of Foundry
Edwin Clark Inventor of Sewing Machine
Carlos Coolidge Patent Attorney
George A. Fairfield Gunsmith and Machinist
Charles E. Billings Apprentice and Die Sinker
George W. Hubbard Apprentice Draftsman

LAMSON, GOODNOW & YALE, 1858-1864

E. G. LAMSON & COMPANY 1864-1865

THE WINDSOR MANUFACTURING COMPANY, 1865-1870
Single and Double Thread Sewing Machines—Machine Tools—Gun Machinery—Trip and Drop Hammers—Springfield Rifles—Ball's Repeating Carabines—Palmer's Breech Loading Carabines—Berdan's Rifles—Lane's Saw Mills—Stone Channelling and Quarrying Machinery—Special Machinery built to order

Ebenezer G. Lamson President and Manager
Eastburne E. Lamson Treasurer
Ralph H. Lamson Works Manager
General Hiram Berdan Firearms Expert

Albert Ball Superintendent, 1863-1868
William Palmer Inventor of Palmer Carbine
Roger Love Bookkeeper
Dennis Lane Inventor of Saw Mills
Quimby S. Backus Machinist and Inventor
David A. Moore Inventor of Ratchet Wrench
Frederick K. Wells Bookkeeper and Cashier, 1860-1865
George H. Coates Apprentice and Machinist
Eben Stocker Apprentice
Luther W. Hawley Secretary
Henry D. Lawrence Apprentice and Bookkeeper
Carlos Coolidge Patent Attorney

JONES, LAMSON & COMPANY, 1870-1883
Cotton Cloth—Textile Machinery—Machine Tools

JONES & LAMSON MACHINE CO., Windsor, Vt., 1876-1888
Turret Lathes and other Machine Tools

Ebenezer G. Lamson Founder and President
Eastburne E. Lamson Secretary
Ralph H. Lamson Manager of Machine Business
Russell L. Jones Manager of Cotton Business
Charles Jewett Jones Treasurer
Henry P. Stone Inventor and Superintendent
W. D. Woolson Assistant Treasurer
Mack D. Mower Apprentice and Machinist

THE WINDSOR MACHINE COMPANY 1888-1915
Turret Lathes—Gridley Automatic Lathes—Gridley Piston and Piston Ring Machines—Gridley Automatic Multiple Spindle Drills

Gilbert A. Davis President, 1888-1902
George W. Hubbard Managing Director, 1888-90
Maxwell Everts President, 1902-06
George O. Gridley Inventor, Manager and Vice-Pres
Frank L. Cone Designer and Superintendent
Mack D. Mower General Foreman
Charles A. Moore Director and President, 1906-11
R. P. Schwerin Director, 1903-11
James C. Potter Director and President, 1911-15
John Johnston Director and Vice-Pres., 1911-15
Neal W. Foster Machinist Later Secretary
Daniel H. Parker Designer and Production Man
Henry E. Warren Toolmaker

THE NATIONAL ACME NEW ENGLAND PLANT, 1915-
Gridley Automatics
George O. Gridley General Manager, 1915-21
Oliver L. Henn Works Manager
Neal W. Foster General Manager and Asst. Treas
Mack D. Mower General Foreman
Daniel H. Parker Office Manager

RELATIONSHIPS

FALES & JENKS MACHINE COMPANY, Pawtucket, R. I.
David Fales and Alvin Jenks formed a partnership at Central Falls, R. I., in 1830, and in 1835, purchased the R. I. patent rights on the Hubbard Rotary Pump. This company still manufactures it, almost unchanged.

ORIGINAL CITY WATER WORKS OF ST. LOUIS, MO.
Asahel Hubbard built and installed first pump in 1830.

Father of Senator Redfield Proctor, who was Secretary of War, Governor of Vt. and founder of Vt. Marble Co.

WHITNEY ARMS COMPANY, Whiteville, Conn.
Colman Hubbard Secretary, 1860-1865.

ROBBINS & LAWRENCE, 1851-1856

SHARPS RIFLE MANUFACTURING COMPANY, 1851-1875
Hartford, Conn.
Sharps Rifles—Enfield Rifles—Machine Tools—Gun Machinery—Weed Sewing Machines

Richard S. Lawrence Master Armorer, 1852-1872 (Aided C. M. Spencer to perfect Spencer Repeating Rifle)
Christian Sharps Inventor and Superintendent (Also Proprietor of SHARPS & HANKINS ARMORY, Phila.)

Hezekiah Conant Draftsman and Inventor (Taught C. M. Spencer drafting, and with him joint inventor of Willamantic Spooler, first machine built by PRATT & WHITNEY, Founder of CONANT THREAD COMPANY)

Rollin White Gunsmith and Inventor (Original Inventor of SMITH & WESSON REVOLVER)

Joseph Dana Alvord Contractor (Became leading Contractor at WHEELER & WILSON CO.)

After 1875 the Sharps Plant became:
THE WEED SEWING MACHINE COMPANY, 1875-1893
Weed Sewing Machines—First Spencer Automatic Screw Machines—Col. Albert Pope's First Bicycles.

George A. Fairfield Founder and President

THE POPE MANUFACTURING COMPANY, 1893-1914
Columbia Bicycles—Pope-Hartford Automobiles

Col. Albert Pope Founder and President
George A. Fairfield Director
Ned Lawrence Superintendent (Son of Richard S. Lawrence.)

PRATT & WHITNEY COMPANY, Hartford Conn.
This company, whose origin was influenced by Sharps Company, purchased the old Sharps Plant in 1914.

Howe's Plain Miller became LINCOLN MILLING MACHINE

ROYAL ARMORY OF GREAT BRITAIN
Enfield Lock, England
Robbins & Lawrence at Windsor, built nearly all the Mechanical Equipment and first 25,000 Interchangeable Army Rifles for British Government, 1854-1856.

President of MISSOURI CAR & FOUNDRY CO., 1872-1876

E. A. STEARNS & CO. Brattleboro, Vt., 1830-1868
(Now part of STANLEY RULE & LEVEL CO., New Britain.)
Hedge Dividing Engines—Hedge Patent Jointed Rules
Lemuel Hedge Inventor and Founder

THE PROVIDENCE TOOL CO
(Now RHODE ISLAND TOOL CO)

Frederick W. Howe Superintendent, 1861-1865

ELIAS HOWE SEWING MACHINE CO. Bridgeport, Conn.
Frederick W. Howe Superintendent, 1865-1868

BROWN & SHARPE MFG. CO., Providence, R. I.
Frederick W. Howe Incorporator and Supt., 1868-1873 (As Consulting Engineer developed Wilcox & Gibbs Sewing Machine and Goodyear Welt Sewing Machinery)
Henry M. Leland served under Mr. Howe about 1870

SMITH & WESSON, Norwich, Connecticut

B. Tyler Henry Gunsmith and Inventor, 1851-1855
Daniel B. Wesson Founder and Inventor

VOLCANIC REPEATING ARMS COMPANY, 1855-1857
NEW HAVEN ARMS COMPANY, 1857/1865
HENRY REPEATING ARMS COMPANY, 1865-1866
WINCHESTER REPEATING ARMS COMPANY, 1866
New Haven and Bridgeport, Conn.
Smith & Wesson, Volcanic and Henry Repeating Rifles, improved forms of Jennings, and forerunners of the modern Winchester Lever Action Repeater

B. Tyler Henry Inventor and Founder
Gov. Oliver Winchester Financier and President

COLTS PATENT FIRE ARMS MFG. CO., Hartford, Conn.
Charles B. Billings Toolmaker and Diesinker, 1856-62
Christopher Spencer Machinist, 1854-1857
George A. Fairfield Contractor, 1857-1865
Charles E. Billings Forging Contractor, 1862-1865

THE BILLINGS & SPENCER COMPANY, Hartford, Conn.
Charles E. Billings Founder and President
Christopher Spencer Founder and Director
Eben Stocker Secretary

HARTFORD MACHINE SCREW COMPANY
Hartford, Conn.
Christopher Spencer Inventor of Hartford Automatic
George A. Fairfield Founder and President

AMOSKEAG MANUFACTURING COMPANY
Manchester, N. H.
William B. Bement Contractor, 1843-1845
George W. Hubbard Draftsman, 1855-1856

INDUSTRIAL WORKS OF BEMENT & DOUGHERTY
Philadelphia
(Now Niles-Bement-Pond, owners of Pratt & Whitney Co.)
William B. Bement Founder and Engineer
George W. Hubbard Assistant to Mr. Bement
George V. Cresson Apprentice Draftsman, 1855-60

CRESSON, HUBBARD & SMITH (Now CRESSON-MORRIS CO.)
Philadelphia.
George W. Hubbard Founder and Engineer
George V. Cresson Founder and Manager

GROUT & WHITE, Winchendon and Orange, Mass.
(Bought out Windsor Sewing Machine Business in 1861.)
Thomas White Inventor and Machinist.
(Founder of WHITE SEWING MACHINE CO)

CLEVELAND AUTOMATOC MACHINE CO. and
WHITE CO. at Cleveland, Ohio.)
W. L. Grout Inventor and Machinist
(A founder of NEW HOME SEWING MACHINE CO.)

SULLIVAN MACHINERY COMPANY, Claremont, N. H.
Albert Ball Founder and Engineer, 1868-1915
Roger Love Founder and Treasurer
(Proprietor of THE DANVERSPOET ROLLING MILL, 1876-78.)

LANE MANUFACTURING COMPANY, Montpelier, Vt.
Dennis Lane Inventor and Founder, 1872-

BACKUS VISE CO., Windsor, Vt. and Millers Falls, Mass.
(Now part of MILLERS FALLS COMPANY.)
Quimby S. Backus Inventor of Vise, Founder
Ralph H. Lamson Manager at Windsor

WILEY & RUSSELL MFG. COMPANY Greenfield, Mass.
WELLS BROTHERS COMPANY Greenfield, Mass.
F. E. WELLS & SONS COMPANY, Greenfield, Mass.
(Now THE GREENFIELD TAP & DIE CORPORATION.)
Frederick E. Wells Organizer and President

COATES CLIPPER MANUFACTURING CO.,
Worcester, Mass.
George H. Coates Founder and President, 1877-1921
Frank L. Cone President, 1921-

ESTEY ORGAN COMPANY, Brattleboro, Vermont.
Luther Hawley. Secretary, 1870-

Industrial Pioneer of Sherbrooke, Province of Quebec.
A founder of the CANADIAN INGERSOLL-RAND CO.

JONES & LAMSON MACHINE CO., Springfield, Vt. 1888-
Hartness Flat Turret Lathes
James Hartness Inventor and President, 1889-
(Pres. of A.S.M.E. 1914; Governor of Vermont, 1921)
W. P. Woolson Treasurer, 1888-
E. R. Fellows Designer
George O. Gridley Secretary to Mr. Hartness
W. L. Bryant Draftsman
F. P. Lovejoy Draftsman
Charles N. Safford Accountant
Related Concerns:
FITCHBURG MACHINE WORKS, Fitchburg, Mass.
James Hartness Inventor of "LO-SWING" Lathe
THE FELLOWS GEAR SHAPER CO., Springfield, Vt.
E. R. Fellows President and General Manager
W. D. Woolson Treasurer
W. L. Bryant Inventor and President
BRYANT CHUCKING GRINDER CO., Springfield, Vt.
F. P. Lovejoy President
Charles N. Safford Treasurer
Gridley Automatic Drill is now the "SUPER-MATIC," built by the ACME MACHINE TOOL COMPANY, Cincinnati.

MAC-TT PARTS COMPANY, Windsor, Vt. 1910-1912.
(Removed to Lancaster, Pa., in 1912.)
Frank L. Cone A Founder and Director, 1910-12
Henry F. Ware Inventor and General Manager

CONE AUTOMATIC MACHINE COMPANY,
Windsor, Vt. 1916-
Frank L. Cone Founder and President