

No. 4480. RICHARD G. BLAMEY and JOHN KULOW, Petersburg, Ont., 10th March, 1875, for 5 years: "A Churn." (Une baratte.)

*Claim.*—The perforated plate or wire-sieve E, E, as described.

No. 4481. WALTER O'HARA and CHARLES M. O'HARA, Fall River, Mass., U. S., 10th March, 1875, for 5 years: "Non-conducting Covering for Boilers, &c." (Enduit anti-calorique pour les chaudières à vapeur, &c.)

*Claim.* 1st The non-conducting cellular composition formed by the combination of ashes and silicate of soda, 2nd. The combination of said composition with jute, bagging and cotton cloth.

No. 4482. MARTIN DEAL, Bucyrus, Ohio, U. S., 10th March, 1875, for 5 years: "Scouring-case for Combined Smutter and Separator." (Boite de nettoyage pour les émotteurs et les séparateurs combinés.)

*Claim.*—1st. The continuous cylindrical scouring-case E, constructed with the horizontal perforations lapping over one another in combination with half round top cover G, as set forth, 2nd. The mode of attaching the scouring-case to the frame A, by the studs F, so as to leave a continuous intervening draught space, as set forth.

No. 4483. EMMANUEL ANDREWS, Williamsport, Pa., U. S., 10th March, 1875, for 5 years: "Improvement on Hand and other Short Saws." (Perfectionnement des scies à manches et autres scies courtes.)

*Claim.*—In combination with a saw handle, the saw blade extended centrally through the same and conforming to the outlines thereof, as described.

No. 4484. ALEXANDER A. MURPHY and CHARLES C. HEARLE, Montreal, Que., 10th March, 1875, for 5 years: "Improvements in Fire Extinguishers." (Perfectionnements aux extincteurs d'incendie.)

*Claim.*—The application of the principle together with the arrangement of the compartments or reservoirs A, B, and connected by a pipe D, E, provided with a valve, as set forth.

No. 4485. JOSEPH H. DORION, Yamachiche, Que., 10 Mars, 1875, pour 5 ans: "Charpente brisée." (Imbricated frame-work.)

*Résumé.*—L'emploi et la disposition particulière des planches A, et C, dans la charpente, soit des pans, des cloisons, du comble ou des planchers d'une maison ou autre construction, et leur consolidation par les planchettes O, le tout tel que décrit.

*Claim.*—The employment and peculiar arrangement of the planks A, and C, in the frame work, either of the sides, partitions, roof or flooring of a house or other building and their consolidation by the boards O, as described.

No. 4486. JAMES L. WILSON, Woodstock, Ont., 10th March, 1875, for 5 years: "Improvements in Watches." (Perfectionnements dans les montres.)

*Claim.*—1st. The slot A, in the common pinion B, to be used in notches which are set on the face of the watch; 2nd. The slot D, in the centre pin E, to be used in watches which are set at the back of the watch, as set forth.

No. 4487. PIERRE MAYRAND, Père, Gentilly, Qué., 12 Mars, 1875, pour 5 ans: "Moulin flottant et machine à fendre le bois de corde." (Floating Mill and Machine for Splitting Cord Wood.)

*Résumé.*—1o Un moulin ou moulin flottant A, ayant les roues dentées D, D', portant chacune une hache E, E', sur leur circonférence, et mises en mouvement par les poulies H, H', dont les essieux portent les roues d'air G, G', et les pignons L, L', pour fendre des billes et des bûches en bois de corde; 2o. La combinaison avec les grandes roues dentées D, D', portant les haches E, E', sur leur circonférence, des pignons I, I', et des poulies K, K', qui font marcher les chaînes sans in M, M', ayant des pistons O, O'. 3o. La combinaison avec les chevâlets B, B', et C, C', portant les grandes roues dentées D, D', des gardes H, H', pour empêcher les quartiers de bois de passer sous la roue D; 4o. La combinaison

avec la poulie P, et les roues dentées Q, R, des élévateurs T, T', et des tabliers S, S'. 5o. La combinaison avec la poulie B, et les roues dentées Q, et V, des glissoirs Y, Z, et les chaînes d'enrayure W, X, &c. La combinaison avec la poulie C, et les roues dentées D', et E', de la chaîne d'enrayure de renvoi F', et de chute A', posée sur la plateforme B'. 6o. La combinaison des grandes roues dentées D, D', chacune portant une hache E, E', sur leur circonférence, des gardes H, H', et des poulies K, K', les pignons d'engrenage L, L', I, I', et J, J', les poulies K, K', la poulie P, les roues dentées Q, R, et Q', V, les élévateurs T, T', les tabliers S, S', et les chaînes d'enrayure W, X, les glissoirs Y, Z, et les chaînes d'enrayure de renvoi F', avec la plateforme B', et la chute A', tel que décrit.

*Claim.*—1st. A mill or floating mill A, having toothed wheels D, D', each carrying an axe E, E', upon its circumference, and set in motion by the pulleys H, H', whose axles support the fly wheels G, G', and the pinions L, L' for splitting cord wood; 2nd. The combination with the large toothed wheels D, D', carrying the axes E, E', upon their circumference, of the pinions I, I', and J, J', and the blocks K, K', driving the endless chains M, M', having bolts O, O'; 3rd. The combination with the racks B, B', and C, C', bearing the large toothed wheels D, D', of the guard H, H', to prevent the split wood from passing under the wheel L. 4th. The combination with the pulley P, and the toothed wheels Q, R, of the elevators T, T', and the apron S, S'; 5th. The combination with the pulley B, and the toothed wheels Q, R, and V, of the slides Y, Z, and the lock chains W, X; 6th. The combination with the pulley C, and the toothed wheels D, D', and E', of the return lock chain F', and of chute A', placed on the platform B'; 7th. The combination of the large toothed wheels D, D', each bearing an axe E, E', upon its circumference, guards H, H', fly wheels G, G', pulleys H, H', gear pinions L, L', I, I', and J, J', blocks K, K', pulley P, toothed wheels Q, R, and Q', V, elevators T, T', aprons S, S', with bars i, i, and links j, j, slides Y, Z, the slide G', and return lock chain F', with the platform B', and the chute A', as described.

No. 4488. GEORGE R. EDWARDS, Galena, Ill., U. S., and SAMUEL ROWE, Yorkville, Ont., 12th March, 1875, for 5 years: "Improvements on Whiffle Trees." (Perfectionnements aux palonniers.)

*Claim.*—1st. The combination of lever plate E, springs H, H', rods D, and bolts C, to hold the bolts B, yielding in the end apertures of the guard a, as set forth; 2nd. The combination with spring hold rods D, D, and draw-rod C, of a cylinder plate lever E, having the rods D, D, and G, pivoted thereto operating by the lever J, as set forth.

No. 4489. JEAN G. HAVA, New-Orleans, La., U. S., 12th March, 1875, for 10 years: "Treatment of Cod Liver Oil." (Traitement de l'huile de foie de morue.)

*Claim.*—The treatment of cod liver oil with a solution of gelatinous tribasic phosphato of lime.

No. 4490. JOSEPH S. GARNER, Galena, Ill., U. S., 12th March, 1875, for 5 years: "Wash Board." (Planche à savonner.)

*Claim.*—The corrugated rollers C, in combination with the wash board, sections B, and frame A, as set forth.

No. 4491. JAMES A. LAKIN, Westfield, Mass., U. S., 12th March, 1875, for 5 years: "Improvements on Overdraw Checks for Horses." (Perfectionnements aux fausses rênes.)

*Claim.*—The combination of the piece a, bar A, straps b, b, and loop c.

No. 4492 HUGO B RATHBUN, and EDWARD W. RATHBUN, Mill Point, Ont., (Assignees of James W. Herington), 12th March, 1875, (Extension of Patent No. 315), for 5 years: "Improvements in machines for Cutting the Headings of Barrels." (Perfectionnements aux machines à tailler les fonds de barils.)

*Claim.*—1st. The employment and use of a carriage T, for conveying the material to the saws C, C'; 2nd. The operation of the carriage T, from the shaft L, by the combination and arrangement of the flexible band V, loose-pulley R, and chuck S, and the manner of engagement and disengagement of the two latter by the operation of the carriage T, upon the angle arm a, and X, and lever P, as described, and the use of a weight W, and cord and pulley to withdraw the carriage from the saws; 3rd. The arrangement and combination of mitre wheels K, K', and J, and lever b, with the shaft B, for operating the carriage T, and endless chain C, by a forward and reverse motion of the shaft L, and 4th. The endless chain c, and operating it from the shaft L, by the drum p and pulley r, as set forth.