



(51) International Patent Classification:
C10L 1/04 (2006.01) C07C 4/06 (2006.01)
C10M 175/00 (2006.01)

(21) International Application Number:
PCT/US2020/021532

(22) International Filing Date:
06 March 2020 (06.03.2020)

(25) Filing Language: English

(26) Publication Language: English

(30) Priority Data:
62/814,405 06 March 2019 (06.03.2019) US

(71) Applicant: **GREEN MARINE FUELS LLC** [US/US];
8985 S. Eastern Avenue, Suite 100, Las Vegas, NV 89123
(US).

(72) Inventors: **KARL, Daniel, Bruce**; P.O. Box 28, Cranford,
AB T0K 0R0 (CA). **KARL, Matthew**; 22502 Susana Ave-
nue, Torrance, CA 90505 (US). **HAMILTON, James, Er-
ic**; RR1 Site4 Box 11, Okotoks, AB T1S 1A1 (CA).

(74) Agent: **BRAGINSKY, Philip, Y.** et al.; TARTER
KRINSKY & DROGIN LLP, 1350 Broadway, 12th Floor,
New York, NY 10018 (US).

(81) Designated States (*unless otherwise indicated, for every
kind of national protection available*): AE, AG, AL, AM,
AO, AT, AU, AZ, BA, BB, BG, BH, BN, BR, BW, BY, BZ,
CA, CH, CL, CN, CO, CR, CU, CZ, DE, DJ, DK, DM, DO,
DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN,
HR, HU, ID, IL, IN, IR, IS, JO, JP, KE, KG, KH, KN, KP,
KR, KW, KZ, LA, LC, LK, LR, LS, LU, LY, MA, MD, ME,
MG, MK, MN, MW, MX, MY, MZ, NA, NG, NI, NO, NZ,
OM, PA, PE, PG, PH, PL, PT, QA, RO, RS, RU, RW, SA,
SC, SD, SE, SG, SK, SL, ST, SV, SY, TH, TJ, TM, TN, TR,
TT, TZ, UA, UG, US, UZ, VC, VN, WS, ZA, ZM, ZW.

(84) Designated States (*unless otherwise indicated, for every
kind of regional protection available*): ARIPO (BW, GH,
GM, KE, LR, LS, MW, MZ, NA, RW, SD, SL, ST, SZ, TZ,
UG, ZM, ZW), Eurasian (AM, AZ, BY, KG, KZ, RU, TJ,
TM), European (AL, AT, BE, BG, CH, CY, CZ, DE, DK,
EE, ES, FI, FR, GB, GR, HR, HU, IE, IS, IT, LT, LU, LV,
MC, MK, MT, NL, NO, PL, PT, RO, RS, SE, SI, SK, SM,

(54) Title: PROCESSES FOR CONVERTING PETROLEUM BASED WASTE OILS INTO LIGHT AND MEDIUM DISTILLATE

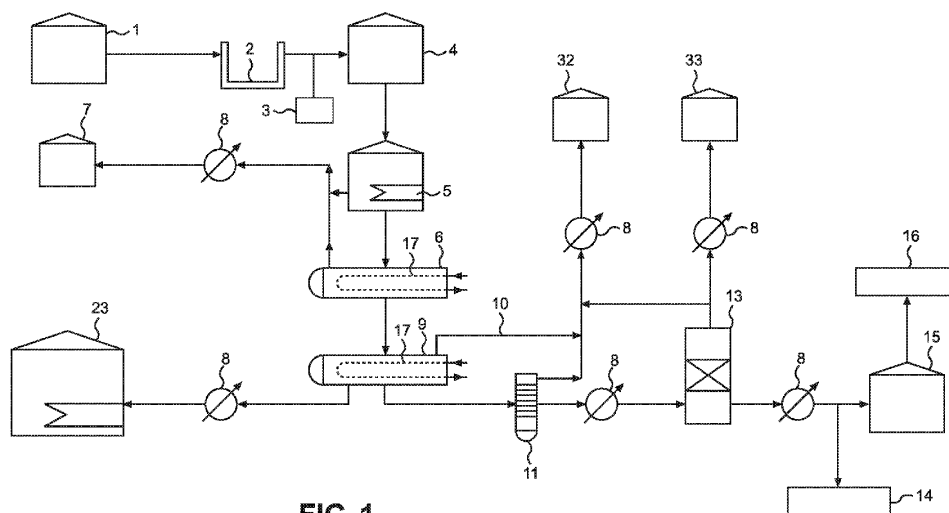


FIG. 1

(57) Abstract: The present technology relates to processes for converting PBWO into light and medium distillate such as usable diesel fuel, the processes generally comprising the steps of: boiling the PBWO to dehydrate the PBWO, heating the PBWO to produce PBWO hydrocarbon vapor, contacting the PBWO hydrocarbon vapor with a catalyst, and cooling the resultant vapor to liquid form through heat exchangers to produce light and medium distillate.

[Continued on next page]

TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW,
KM, ML, MR, NE, SN, TD, TG).

Declarations under Rule 4.17:

— *of inventorship (Rule 4.17(iv))*

Published:

— *with international search report (Art. 21(3))*