

(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property
Organization
International Bureau

(43) International Publication Date
24 August 2023 (24.08.2023)



(10) International Publication Number
WO 2023/158316 A1

- (51) International Patent Classification:
B63B 35/44 (2006.01) *B63B 21/50* (2006.01)
- (21) International Application Number:
PCT/NO2023/050027
- (22) International Filing Date:
01 February 2023 (01.02.2023)
- (25) Filing Language: English
- (26) Publication Language: English
- (30) Priority Data:
20220209 15 February 2022 (15.02.2022) NO
- (71) Applicant: OCEAN SUN AS [NO/NO]; Snarøyveien 20, 1360 FORNEBU (NO).
- (72) Inventors: BJØRNEKLETT, Børge; Vollsveien 216, 1359 Eiksmarka (NO). KRISTENSEN GRØN, Petter; Middelthuns gate 15C, 0368 Oslo (NO). AJIWASKITA, Farhan; c/o OCEAN SUN AS, Snarøyveien 20, 1360 FORNEBU (NO).
- (74) Agent: MIKALSEN, Rikard; Steendamswisch 24c, 22459 Hamburg (DE).
- (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, CV, CZ, DE, DJ, DK, DM, DO, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, GT, HN, HR, HU, ID, IL, IN, IQ, IR, IS, IT, JM, JO, JP, KE, KG, KH, KN, KP, KR, KW, KZ, LA, LC, LK, LR, LS, LU, LY, MA, MD, 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.

(54) Title: MOORING OF FLOATING PHOTOVOLTAIC POWER PLANTS

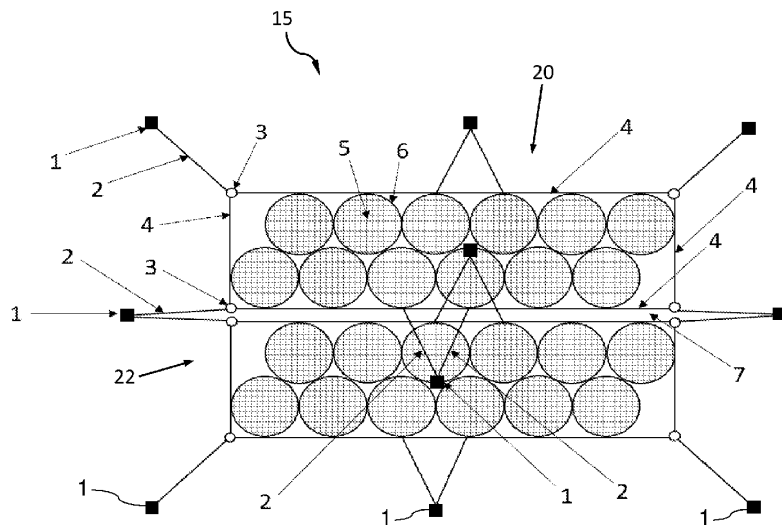


Fig. 1A

(57) Abstract: A mooring system for securing an array of solar panel arrangements in a body of water (29), the system comprising a floating structure (20,22) comprising a plurality of solar panel arrangements (5), each comprising a floating collar (30) and a plurality of photovoltaic panels (31) arranged inside and supported by the floating collar (30) via a mat (31) on which the plurality of photovoltaic panels (31) are arranged, the mat (31) being fixed to the floating collar (30), and wherein the floating structure (20,22) comprises a polygonal, horizontally arranged peripheral frame (4) to which the plurality of solar panel arrangements (5) are fixed via the floating collar (30), the plurality of solar panel arrangements (5) are arranged inside the peripheral frame (4), and the peripheral frame (4) is fixed to a plurality of anchors (1) via mooring lines (2).

[Continued on next page]

(84) Designated States (*unless otherwise indicated, for every kind of regional protection available*): ARIPO (BW, CV, 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, ME, MK, MT, NL, NO, PL, PT, RO, RS, SE, SI, SK, SM, TR), OAPI (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, KM, ML, MR, NE, SN, TD, TG).

Published:

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