UNITED STATES SECURITIES AND EXCHANGE COMMISSION WASHINGTON, D.C.

FORM 6-K

REPORT OF FOREIGN PRIVATE ISSUER Pursuant to Rule 13a-16 or 15d-16 under the Securities Exchange Act of 1934

For the month of December 2024

COMMISSION FILE NUMBER: 001-33373

CAPITAL CLEAN ENERGY CARRIERS CORP.

(Translation of registrant's name into English)

3 Iassonos Street Piraeus, 18537 Greece (Address of principal executive offices)

Indicate by check mark whether the Registrant files or will file annual reports under cover of Form 20-F or Form 40-F.

Form 20-F $\ \square$

Form 40-F □

Attached as Exhibit I hereto is a copy of the press release of Capital Clean Energy Carriers Corp. announcing the results of its annual meeting of shareholders held in Piraeus, Greece on December 5, 2024.

Exhibit I to this report on Form 6-K is hereby incorporated by reference into the registrant's Registration Statement on Form F-3 (File No. 333-282610).

SIGNATURES

Pursuant to the requirements of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned, thereunto duly authorized.

CAPITAL CLEAN ENERGY CARRIERS CORP.

Dated: December 17, 2024

/s/ Gerasimos (Jerry) Kalogiratos

Name: Gerasimos (Jerry) Kalogiratos Title: Chief Executive Officer



Capital Clean Energy Carriers Corp. Announces Results of Its Annual Meeting of Shareholders

ATHENS, GREECE, December 11th, 2024 – Capital Clean Energy Carriers Corp. (NASDAQ:CCEC) (the "Company") today announced that it held its Annual Meeting of Shareholders in Piraeus, Greece on December 5th, 2024. At that meeting:

- 1. The current eight directors of the Company were re-elected to serve until the 2025 Annual Meeting of Shareholders, and until their successors are elected and qualified; and
- 2. The appointment of Deloitte Certified Public Accountants S.A., as independent registered public accounting firm for the fiscal year ending December 31, 2024, was ratified.

About Capital Clean Energy Carriers Corp.

Capital Clean Energy Carriers Corp. (NASDAQ: CCEC), an international shipping company, is one of the world's leading platforms of gas carriage solutions with a focus on energy transition. CCEC's in-the-water fleet includes 18 high specification vessels, including 12 latest generation LNG/Cs and six legacy Neo-Panamax container vessels. CCEC has agreed to sell three Neo-Panamax container vessels by the first quarter of 2025. In addition, CCEC's under-construction fleet includes six additional latest generation LNG/Cs, six dual-fuel medium gas carriers and four handy liquid CO2/multi-gas carriers, to be delivered between the first quarter of 2026 and the third quarter of 2027.

Contact Details:

Investor Relations / Media

Brian Gallagher EVP Investor Relations Tel. +44-(770) 368 4996

E-mail: <u>b.gallagher@capitalmaritime.com</u>

Nicolas Bornozis Capital Link, Inc. (New York) Tel. +1-212-661-7566

E-mail: ccec@capitallink.com