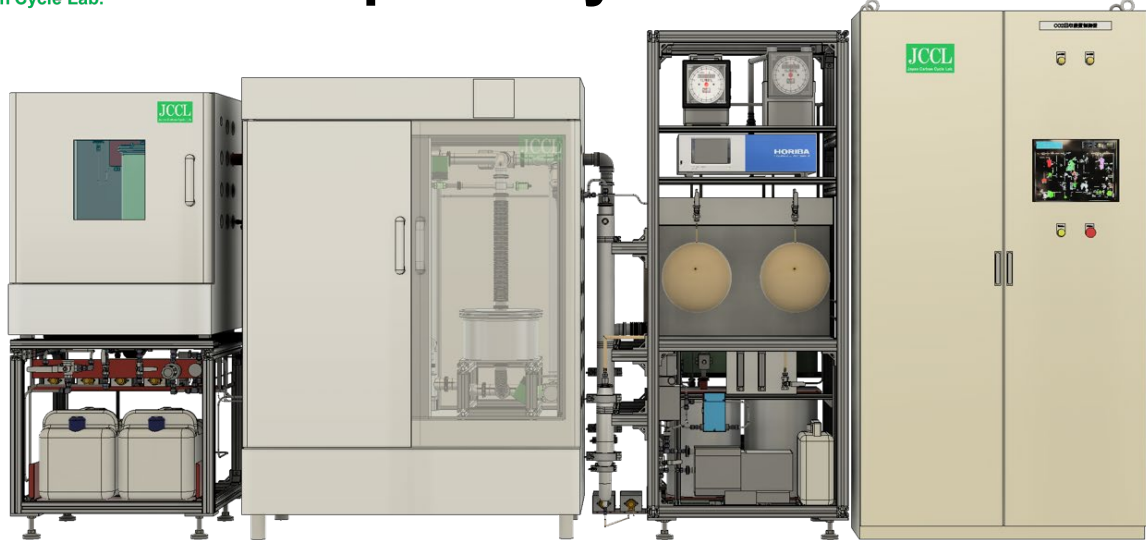


Vacuum Steam Pressure Swing CO₂ Capture System (VPSA1: 2kg-CO₂/day)



The VPSA series is a CO₂ recovery system that uses a solid absorber and reduced-pressure steam to capture, separate, and concentrate CO₂. It achieves CO₂ recovery with 99%+ purity from gas containing about 7% CO₂, such as in city gas combustion exhaust. This system can also evaluate CO₂ absorbents and support the development of CO₂ capture processes.

Features

- **Efficient CO₂ recovery** : Accomplished through a pressure and humidity regulation mechanism using depressurized steam to supply condensation heat to the absorbent.
- **Adjustable recovery conditions** : Adjustable gas temperature, CO₂ concentration, and relative humidity for optimizing recovery conditions across diverse post-combustion exhaust gases and indoor air.
- **Continuous monitoring** : Recovered gas volume and CO₂ concentration are monitored using a volumetric flowmeter and NDIR CO₂ meter.
- **Reliable long-term durability** : Automatic calibration and control features ensure reliable long-term durability testing.

Equipment Specifications

- | | |
|--|--|
| - Supply gas volume : 20 SLM | - CO ₂ concentration measurement: NDIR type |
| - Operating temperature : 40 °C - 60 °C | - Supply gas volume control: mass flow measurement method |
| - Supply gas CO ₂ concentration : 1 - 20 %
(1% or less on request) | - Recovered gas volume measurement: volume flow measurement method |
| - Supply gas pressure : atmospheric pressure | - Water supply and drainage equipment: peristaltic pump |
| - Water vapor supply during recovery : 0 - 5 SLM | - Reduced pressure steam supply: reduced pressure boiler method |
| - Controllable pressure during recovery : 7 kPa - 20 kPa | |

- ❖ Please contact us for delivery date and price
- ❖ We also offer contracted evaluation tests, endurance tests, and acid gas endurance tests

JCCL, Inc.

Ito Lab Plus R&D Building (Rm. 215), 5-5, Kyudai Shinmachi,
Nishi-ku, Fukuoka City, Fukuoka Prefecture, 819-0388

TEL : 092-805-1566 / EMAIL : inquiry@jccl.co.jp

JCCL Website

