

Harvard Forest Data Archive HF224-02

Data File:

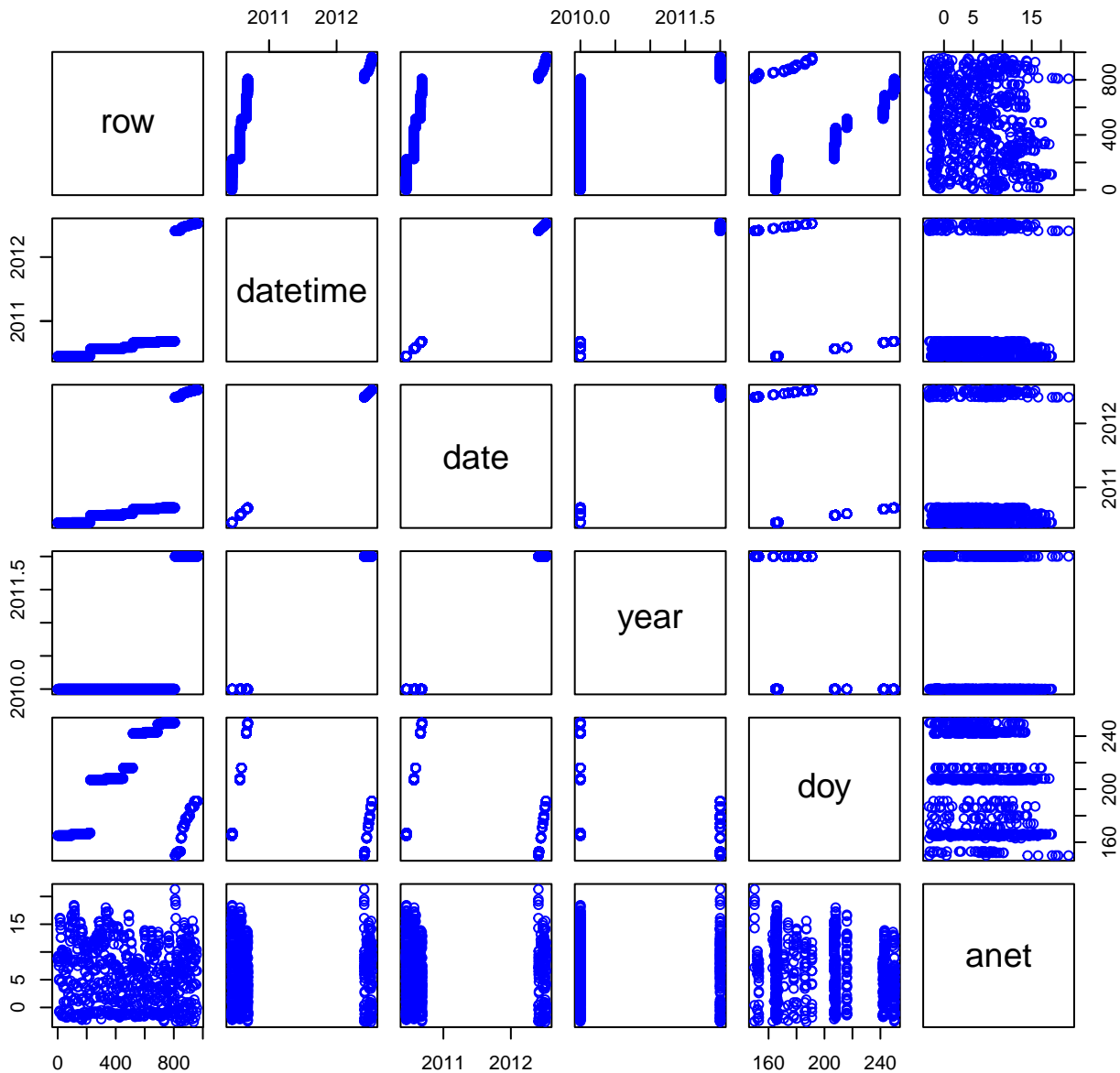
Name = hf224-02-light-response.csv
Description = light response curves
Rows = 1927 Columns = 42
MD5 checksum = 37543d2ce1c8c771e70d3456996b0297

Variables:

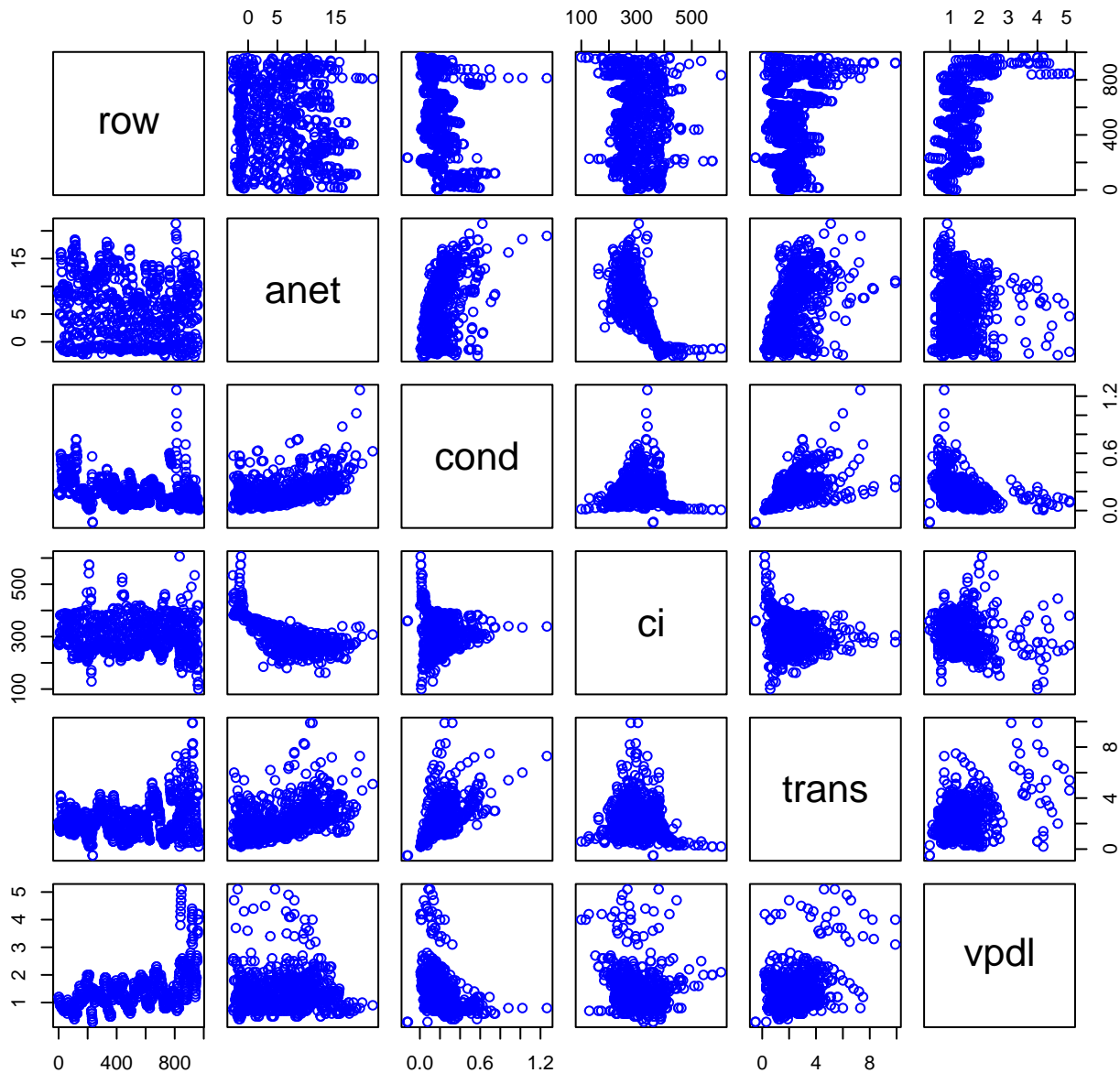
datetime = date and time of measurement
date = date sampled
year = year sampled
doy = corresponding day of the year (nominalDay)
anet = net assimilation in micromols CO2 per meter squared per
second (micromolePerMeterSquaredPerSecond)
cond = conductance to H2O in millimols of H2O per meter squared per
second (millimolePerMeterSquaredPerSecond)
ci = intercellular CO2 concentration (calculated) in micromols CO2
per
mol (dimensionless)
trans = transpiration rate in millimol H2O per meter squared per
second (millimolePerMeterSquaredPerSecond)
vpdl = vapour pressure deficit based on leaf temperature
(kPa)
(kilopascal)
ctleaf = computed leaf temperature. Same as Tleaf unless doing
energy
balance (celsius)
area = total area of leaf enclosed within the chamber in
centimeters
squared (squareCentimeters)
stm.ratio = stomatal Ratio used in calculations (dimensionless)
tair = temperature in sample cell (celsius)
tleaf = temperature of leaf thermocouple (celsius)
tblk = temperature of cooler block (celsius)
co2.r = reference cell CO2 concentration in micromol CO2 per mol
(ppm) (dimensionless)
co2.s = sample cell CO2 concentration in micromol CO2 per mol
(ppm)
(dimensionless)
h2o.r = reference cell H2O concentration in millimol H2O per mol
(ppm) (dimensionless)
h2o.s = sample cell H2O concentration in millimol H2O per mol
(ppm)
(dimensionless)
rh.r = relative humidity in the reference cell (%) (dimensionless)
rh.s = relative humidity in the sample cell (%) (dimensionless)
flow = flow rate to the sample cell in micromols per
second
(micromolePerSecond)
par.in = quantum sensor inside the chamber
(micromolePerMeterSquaredPerSecond)
par.out = external quantum sensor
(micromolePerMeterSquaredPerSecond)
press = atmospheric pressure (kilopascal)
stability = stability status (dimensionless)
leaf.n = leaf nitrogen in milligrams of N per gram of dry
leaf
(milligramPerGram)

| Variable | Min | Median | Mean | Max | NAs |
|-----------|------------------|------------|------------------|------------|------|
| datetime | 2010-06-14T10:43 | | 2012-07-09T12:23 | | 0 |
| date | 2010-06-14 | 2010-08-04 | 2010-11-19 | 2012-07-09 | 0 |
| year | 2010.000 | 2010.000 | 2010.326 | 2012.000 | 0 |
| doy | 150.000 | 207.000 | 204.220 | 250.000 | 0 |
| anet | -3.700 | 6.400 | 6.172 | 21.800 | 199 |
| cond | -0.127 | 0.182 | 0.202 | 1.264 | 0 |
| ci | 100.000 | 293.000 | 302.617 | 606.000 | 0 |
| trans | -0.500 | 2.100 | 2.269 | 9.900 | 0 |
| vpdl | 0.300 | 1.300 | 1.390 | 5.400 | 0 |
| ctleaf | 20.400 | 29.750 | 30.400 | 40.500 | 1613 |
| area | 3.000 | 6.000 | 5.919 | 6.000 | 0 |
| stm.ratio | 0.000 | 0.000 | 0.086 | 1.000 | 0 |
| tair | 22.800 | 25.700 | 26.688 | 45.800 | 0 |
| tleaf | 20.400 | 26.400 | 26.892 | 40.500 | 0 |
| tblk | 22.200 | 25.000 | 26.293 | 48.000 | 0 |
| co2.r | 372.000 | 380.000 | 381.731 | 476.000 | 0 |
| co2.s | 350.000 | 373.000 | 371.802 | 409.000 | 0 |
| h2o.r | 1.200 | 20.300 | 19.822 | 35.400 | 0 |
| h2o.s | 13.300 | 22.800 | 22.824 | 43.100 | 0 |
| rh.r | 4.000 | 58.000 | 55.791 | 88.000 | 0 |
| rh.s | 21.000 | 66.000 | 63.813 | 88.000 | 0 |
| flow | 107.000 | 500.000 | 468.661 | 501.000 | 0 |
| par.in | 0.000 | 400.000 | 525.416 | 1802.000 | 0 |
| par.out | 2.000 | 631.000 | 701.669 | 1789.000 | 0 |
| press | 95.600 | 97.100 | 96.937 | 97.700 | 0 |
| stability | 0.000 | 0.800 | 0.811 | 1.000 | 0 |
| leaf.n | 11.700 | 20.500 | 20.636 | 38.000 | 87 |

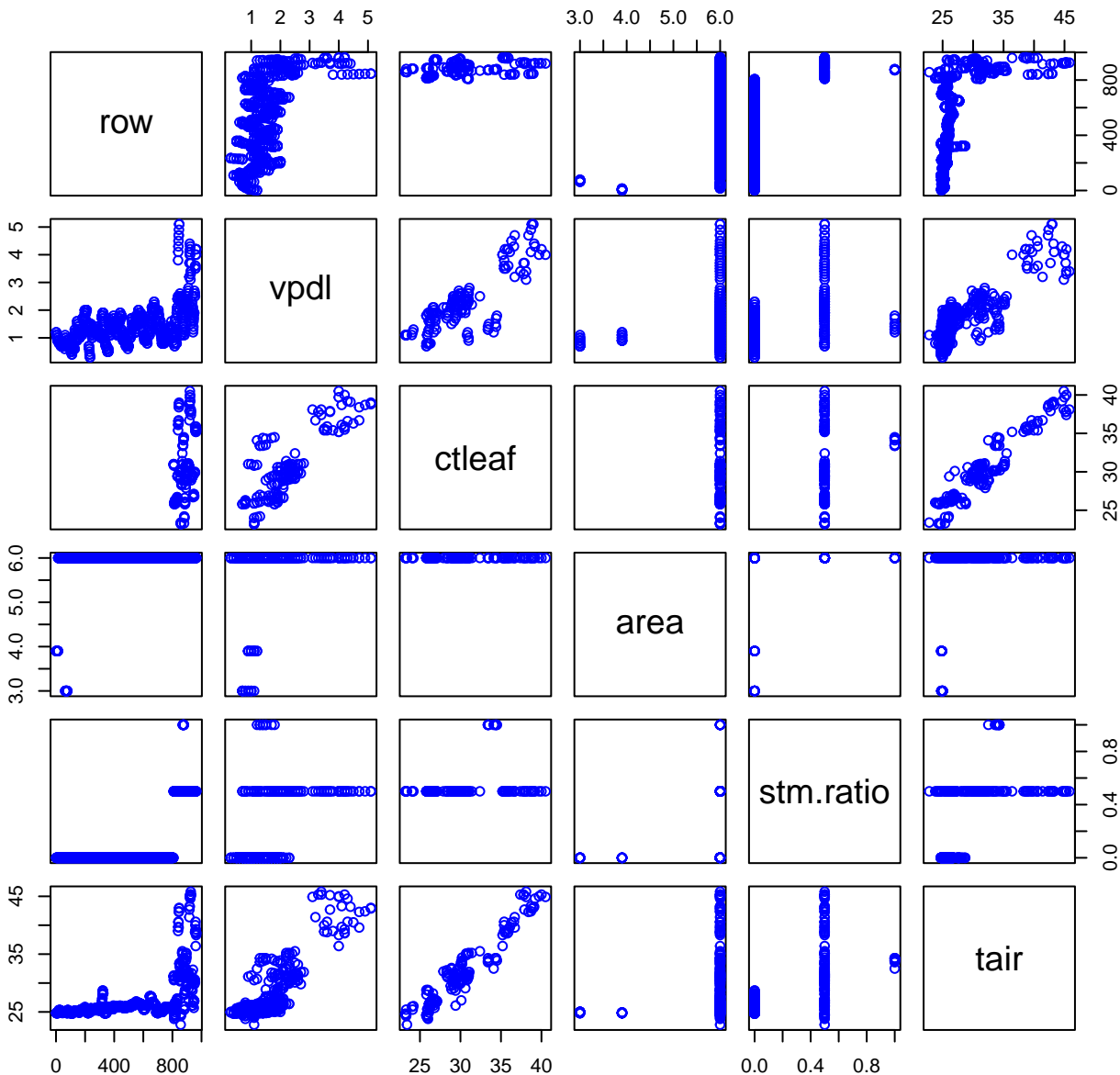
HF224-02 Plot 1



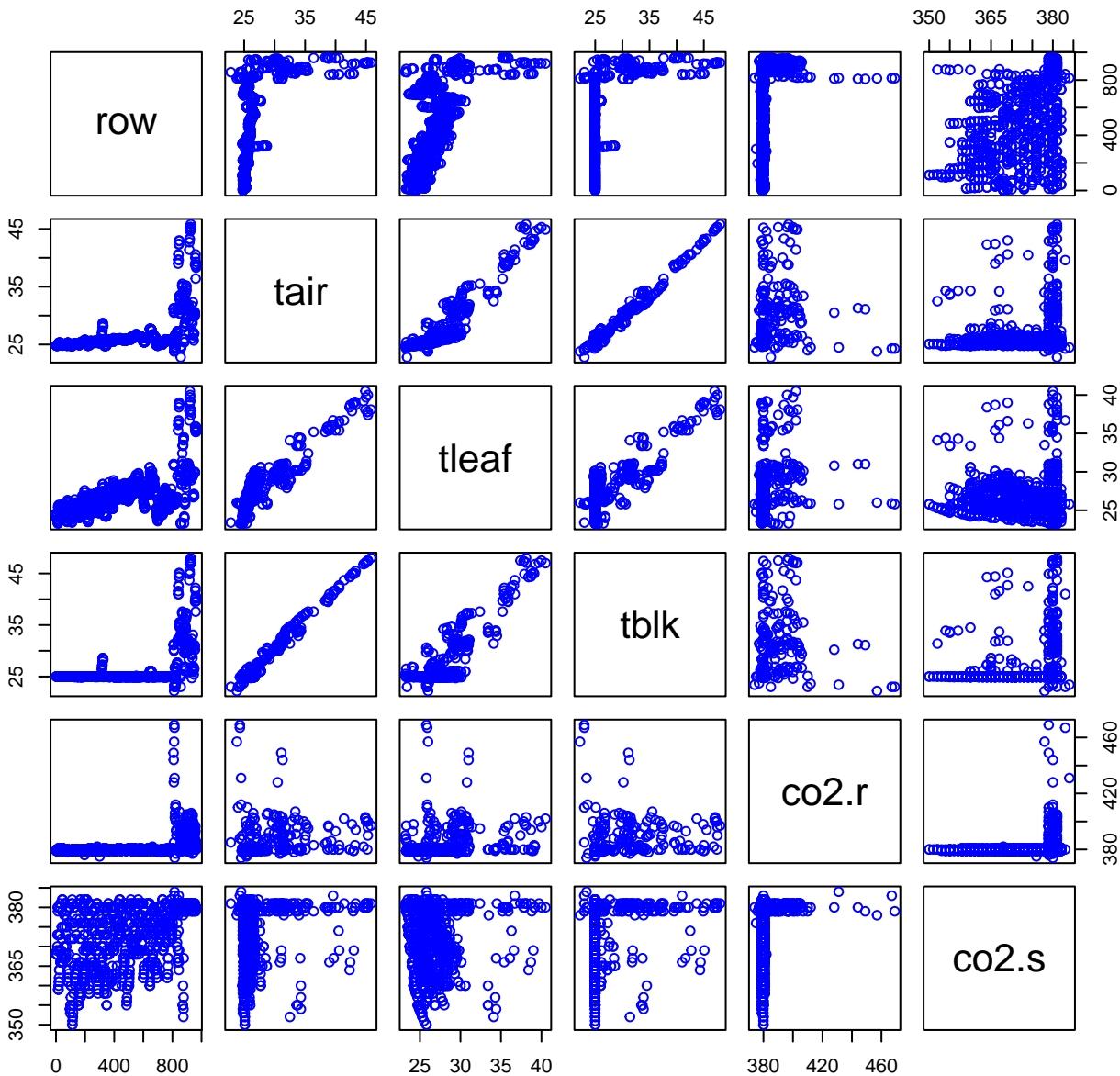
HF224-02 Plot 2



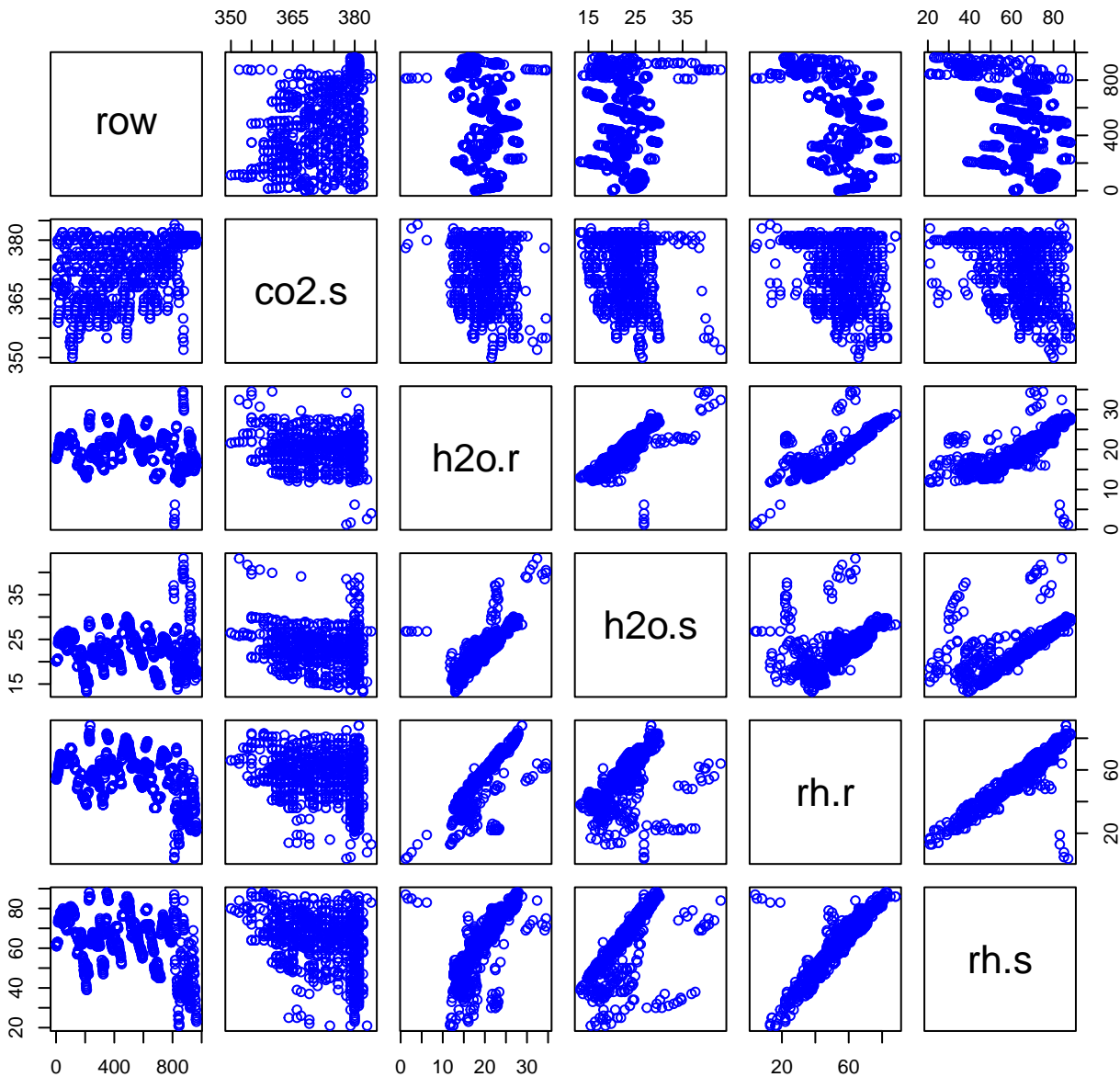
HF224-02 Plot 3



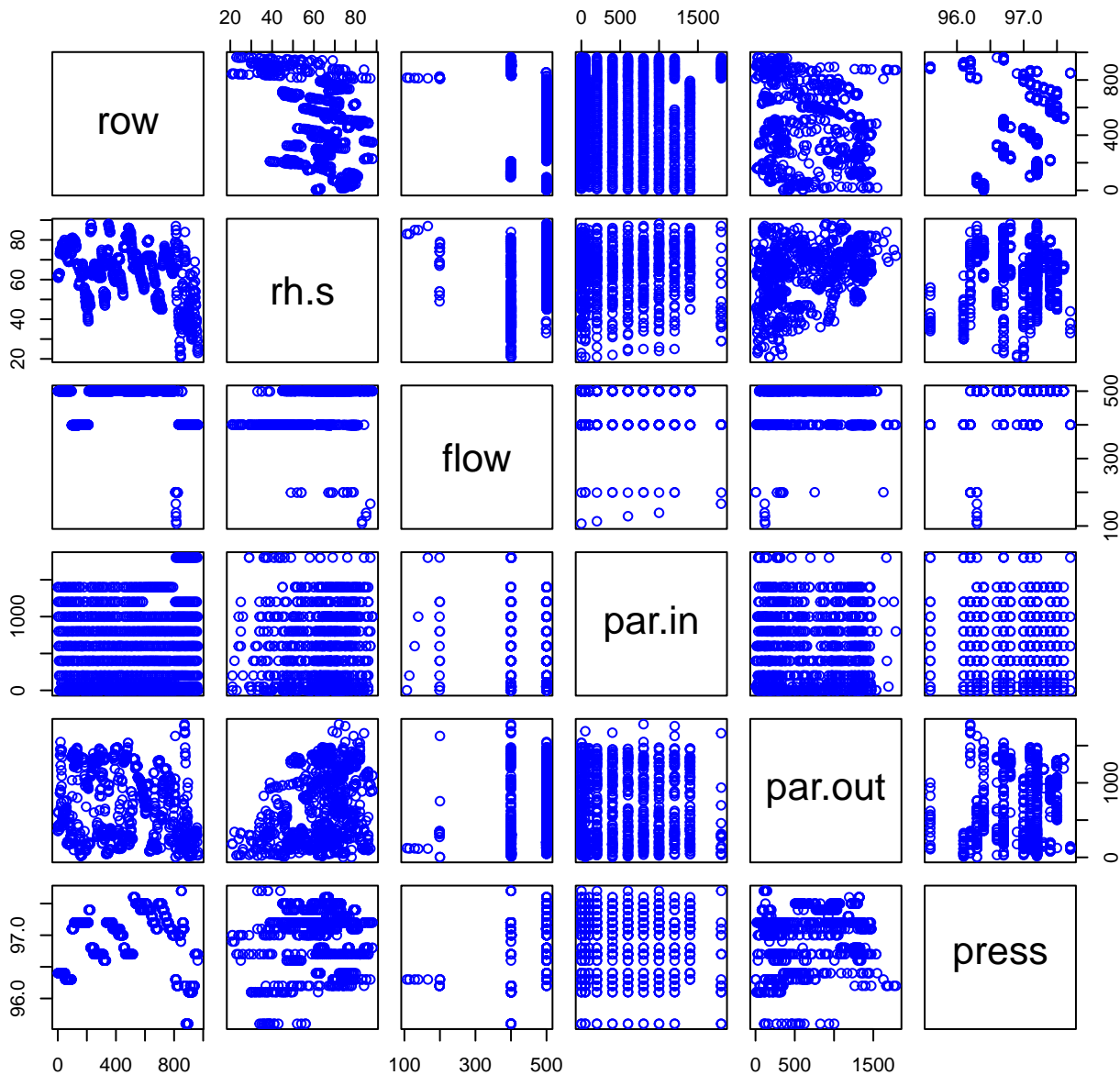
HF224-02 Plot 4



HF224-02 Plot 5



HF224-02 Plot 6



HF224-02 Plot 7

