



CNG ECOSYSTEM DEVELOPMENT





ABOUT US:

Celsara Nigeria Limited' is a company formed by Industry veterans having a cumulative experience of more than 3 decades in Oil & Gas and Transportation Industry. "BHAISHREE PETROLEUM", " SANMISH ENERGIES" & " CELPLAS INDUSTRIES' have joined hands to provide state of the art, seamless experience and service in the field of green mobility.

With experience of retro-fitment of more than 1000+ Trucks/Busses from Diesel to CNG and with industry experience of Indraprashta Gas Ltd, Mahanager Gas Ltd India and other CGD entities, the team makes a perfect blend of innovation, technology, service and quality.



WHAT WE OFFER

CELSARA' IS COMMITTED TO PROVIDE A "ONE-STOP SOLUTION" FOR THEIR GREEN ENERGY NEEDS. OUR PRODUCTS/SERVICES ARE:



Retrofitment of Vehicles & Generators from Diesel to CNG



Complete CNG Station: Designing, Engineering, Execution and Implementation Solutions



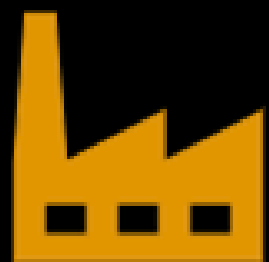
CNG Storage & Transportation Solution



CNG Distribution System: A solution for Commercials, Industries, Hospitals and Residences



CNG STATIONS



CELSARA TEAM IS PROUDLY ASSOCIATED WITH LARGEST FUEL RETAIL COMPANIES OF INDIA, NAMELY, INDIAN OIL, BHARAT PETROLEUM, GAIL, RELIANCE, CONFIDENCE, AEGIS, IPPL AND MANY MORE.



OUR DESIGN TEAM OPTIMIZES AND DESIGNS THE MOST EXQUISITE FUEL RETAIL STATIONS WITH PROPER SPACE AND EQUIPMENT UTILIZATION.



PROPER SELECTION OF EQUIPMENT'S WRT STATION SIZE, VEHICLE TYPE AND VEHICLE POPULATION IS VERY CRITICAL

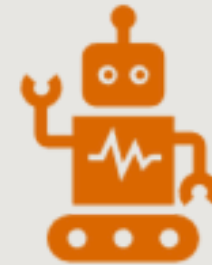


WITH ALMOST ALL THE EQUIPMENT'S BEING WITH US IN-HOUSE OR IN PARTNER COMPANIES, WE ARE THE MOST COST VIABLE SOLUTION PROVIDER FOR OUR CUSTOMERS.



MOTHER/ONLINE /DAUGHTER STATIONS

01



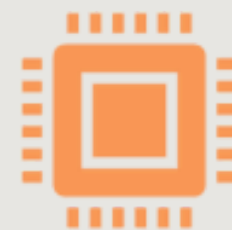
EXTENSIVE EXPERIENCE OF DESIGNING, CONSTRUCTION AND IMPLEMENTATION OF CNG MOTHER/ONLINE STATIONS

02



IN-HOUSE/STRATEGIC PARTNERSHIPS FOR COMPRESSORS, BOOSTERS, DISPENSERS, CASCADES, HIGH PRESSURE INSTRUMENTATION AND MECHANICAL TUBES & FITTINGS AND OTHER STATION EQUIPMENT'S.

03



COST EFFECTIVE DESIGNING TO SUITE THE DEMAND.





MOBILE CNG REFUELLING STATION (MRU):

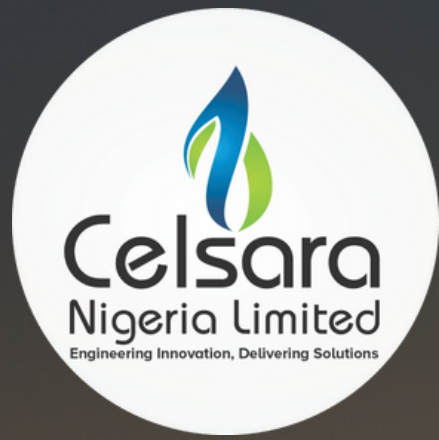
- **COMPACT AND EASE OF MOBILITY.**
- **REFUELING OF LIGHT AND HEAVY-DUTY VEHICLES ON THE GO.**
- **POSSIBILITY TO REFUEL FIXED GROUND STORAGE FOR INDUSTRIES, HOUSES, RESTAURANTS, POWER GENERATORS, ETC.**
- **POSSIBILITY TO DISCHARGE TRAILER UNTIL 30 BAR**
- **POSSIBILITY TO SELF-RECHARGE FROM PIPELINE**
- **COMPLETELY INDEPENDENT FROM EXTERNAL POWER SOURCES**
- **STORAGE CAPACITY ACCORDING TO APPLICATION NEEDS.**
- **CAPACITY CAN BE DESIGNED TO FILL AS PER REQUIREMENT**





BENEFITS OF MOBILE CNG STATION:

- **TRUCKS FUEL WHILE PARKED OVERNIGHT**
- **DRIVERS SPEND THEIR TIME DRIVING INSTEAD OF FUELING**
- **INCREASE FUEL COST SAVINGS AND INCREASE PROFITABILITY**
- **NO LARGE CAPITAL EXTENSIVE INVESTMENTS**
- **NO LONG-TERM FUEL SUPPLY CONTRACTS**
- **NO CONNECTION TO NATURAL GAS PIPELINE**
- **TAKE CONTROL OF ONE OF YOUR LARGEST OPERATING COSTS**
- **CONCEPT IS BASED UPON HELPING TO SOLVE THE 'CHICKEN & EGG' – FUELING & NGVS – PARTICULARLY WHERE THERE WERE/ARE NO PIPELINE CONNECTIONS AVAILABLE.**
- **ALSO USED AS A STRATEGY TO DELIVER GAS ON A TEMPORARY BASIS TO VEHICLES, COMMERCIAL SECTOR OR SMALL INDUSTRIAL GAS CONSUMERS**



STORAGE & TRANSPORTATION SOLUTIONS

**TYPE 1, 3 & 4
CYLINDERS FOR
CNG**

**STORAGE
SOLUTIONS FROM
60 LTRS TO 20000
LTRS**

**CNG CASCADES
FOR MOBILIZING
CNG TO PLACES
NOT CONNECTED
WITH PIPELINES.**

**CNG/LPG MOBILE
REFUELING SYSTEM
FOR DOOR-STEP
DELIVERY OF FUEL**

**LNG SMALL
CYLINDERS FOR
CARRYING MORE
GAS IN LESS
VOLUMES**



STORAGE & TRANSPORTATION SOLUTIONS

**OUR TEAM OF EXPERTS HAVE DEVELOPED, TESTED AND CURATED THE TECHNOLOGY OF VEHICLES
RUNNING ON CNG DELIVERING SUPERIOR PERFORMANCE WITH SIMILAR FUEL EFFICIENCY
LEADING TO HUGE COST SAVINGS.**



**Existing Diesel
Cars/Trucks/Busses
shall be converted to
Monofuel CNG Cars/
Trucks/Busses**



**Complete Engine
Overhauling**



**Technology for CI
Engine to be
modified into SI
Engine**



**CNG Storage
Options providing
range as per
requirement**



- **INNOVATIVE SOLUTIONS FOR MAKING CNG AVAILABLE FOR COMMERCIALS, INDUSTRIES, HOSPITALS, SCHOOLS, RESIDENTIAL SOCIETIES.**
- **COST EFFECTIVE WAY OF REPLACING DIESEL WITH GREEN FUELS**
- **HIGH PRESSURE HANDLING WITHOUT ANY MANUAL INTERVENTION**
- **PLUG & PLAY**

CNG DISTRIBUTION/ REGULATION SYSTEM

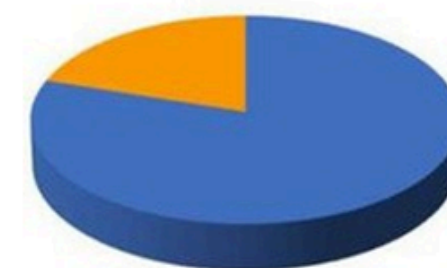


GENSET DUAL FUEL BASICS KNOWLEDGE

Dual Fuel Technology Benefits

- Low Impact engine conversion
- Diesel mode full backup
- Low-and High-pressure Natural Gas compatible
- No power loss after Dual Fuel conversion
- No torque loss after Dual Fuel conversion
- Reduce the engine pollutions
- Better engine oil quality
- Less operative costs

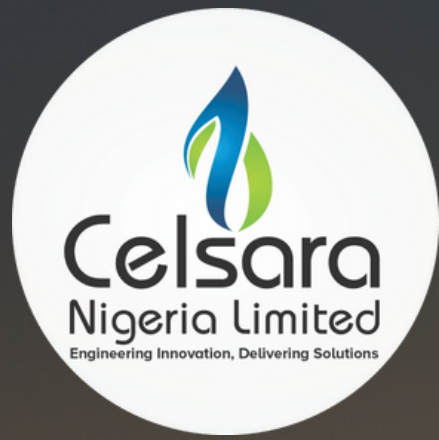
Diesel / Natural Gas Substitution Rate



■ 50-70% Natural Gas

■ 30-50% Diesel

The Average Diesel/Natural Gas substitution rate could vary in a range between 50 to 80%, according with the type of engine and the average load applied moreover the natural gas quality.



BENEFITS OF DUAL FUEL KIT INSTALLATION

01

- FLEXIBILITY TO OPERATE BETWEEN DIESEL AND DUAL FUEL (DIESEL + NATURAL GAS/ LPG) MODE.

02

- IN DUAL FUEL MODE, THE SAME DIESEL MODE POWER IS AVAILABLE

03

- IN OLD ENGINES, WHERE THE DIESEL SYSTEM IS DEGRADED, DUAL FUEL OPERATION OFFERS BETTER POWER THAN DIESEL MODE.

04

- OPERATING COST SAVINGS DUE TO THE HIGHER ENERGY CONTENT OF GAS AND NATURAL GAS PRICING.

05

- NO MAJOR MODIFICATION TO THE BASE ENGINE

06

- NO ADDED EXHAUST BACK PRESSURE AND ASSOCIATED ISSUES.

07

- NO PARTICULATE MATTER DISPOSAL ISSUES.

08

- QUICK INSTALLATION (2 TO 3 DAYS) IN CASE OF NATURAL GAS AVAILABILITY NEAR GENSET LOCATION.

09

- AUTOMATIC SET TO 100% DIESEL IN CASE OF TROUBLE DETECTION



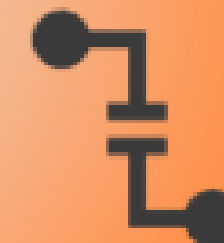
KEY FEATURES



**OMS IN HOUSE CONTROLLER
(MAKE IN INDIA) 7 INCH
TOUCHSCREEN DISPLAY**



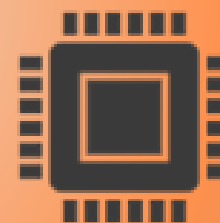
**ALL PERFORMANCE
PARAMETERS AND ERROR
MESSAGES ARE DISPLAYED ON
ASCREEN**



**KNOCK AND EXHAUST
TEMPERATURE BASED SAFETY
LOGIC HAS ADDED LOAD-BASED
CONTROL**



**30 TO 70% DIESEL SUBSTITUTION
DEPENDING ON LOAD CYCLE
AND GAS QUALITY 12 V TO 24 V
DC SUPPLY COMPATIBLE**



**SYSTEM IS TELEMATICS CAPABLE
(CLOUD BASED REMOTE
MONITORING) AUTOCALIBRATION
AND FUZZY LOGIC FOR BETTER
ENGINE SAFETY**



**GAS FLOW METER CAN BE
ADDED AS PER CUSTOMER
REQUIREMENT**



OUR CNG PRODUCT RANGE

01

CNG DISPENSERS

02

CNG MOBILE REFUELING UNIT

03

**CNG INTEGRATED SYSTEM/CNG
PNEUMATIC BOOSTERS/HYDROGEN
BOOSTERS**

04

GAS ENGINES

05

GAS GENERATORS



LOCAL ESTABLISHMENT IN NIGERIA



We are a Local Nigerian Company



We have plans of establishing local manufacturing of equipment's



Celsara is a Local Nigerian Entity and shall ensure 100% post sales support.



COSTING :

Our Customized solutions will ensure best prices to industry

Depending on requirement, costing shall be submitted for Online/Mother/Daughter Stations and MRU.



PHOTOGRAPHS





PROJECTS





**THANK
YOU.**