



GPS RENEWABLES AT A GLANCE

- Bioenergy technology & EPC firm, founded & built by 1st generation entrepreneurs from IIMs, IITs & NITs
- Strong corporate governance since inception with Independent Directors such as V Subramanian & Pratima Ram
- We have reinvented biogas technology for urban applications. Today GPS' BioUrja is the most successful captive biogas solution with ~ 100 installations and many global firsts
- We are now graduating towards bioenergy project development with the active support and mentorship of Neev

Shareholders



Marquee clients



Technology & Service Partners



... and many more

OUR MISSION

“To be the go-to solutioning partner for leading bioenergy project developers”

OUR VISION

“To be the world’s leading bioenergy project developer”

OUR CLIMATE & TECH4GOOD JOURNEY STARTED MUCH BEFORE GPS ...

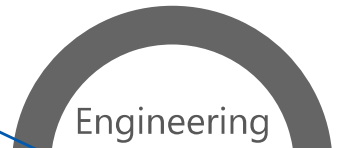


Mainak Chakraborty
Co-founder & CEO



Sreekrishna Sankar,
Co-founder & COO

Part of one of the only 2 FIRA
robotoccer teams in India

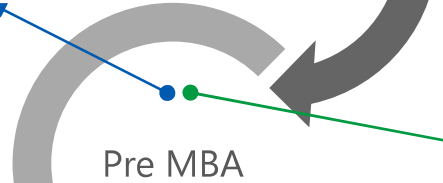


Part of the founding team of
Free Software Foundation, India,
under college senior, Arun M



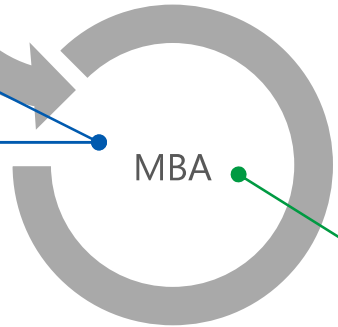
Drafted IIMB's
sustainability
roadmap in 2009,
alongwith Prof
Damodaran and
Prof B Mahadevan

Designed &
developed "Made
in India" products,
starting with
Tata Elxsi



Joined IBM Software Labs.
Continued with pro-bono work
for people with visual, cognitive
and motor challenges in
Trivandrum area with SPACE

Attempted starting a EV
retrofitting company in
2010 alongwith Amarendra
Sahu, now CEO, Nestaway



Attempted starting up in 2008
with Sahil Barua and Ajith Pai,
now, CEO & COO, Delhivery

That's not all. The top B-school has drawn up a plan, according to which its campus - which will switch to green - is expected to achieve sustainability by 2015. The institute, which embarked on its green march this year, plans to grow exotic plants species and considerably reduce energy consumption.

CARBON CREDITS

Mainak Kumar Chakraborty, an IIMB student, said, "By introducing rain water harvesting and water recycling, we've been able to reduce water bills by 30 per cent compared with last year. In a couple of years, we should be self-reliant in water consumption."

REDUCE RESOURCES' USE

Prof and dean (administration) B Mahadevan said, "We have chalked out three steps.

mint
Entrepreneurship gains ground as a career choice on campuses

CITIZEN MATTERS Blogs
Cities ▾ Current Civic Commute Governance Economy Education Environment Health Infrastructure Waste
HOME > ENTREPRENEUR'S CORNER > Tools for bootstrappers
Tools for bootstrappers
May 22, 2008 by Anjana Vivek
Entrepreneurs are often strapped of cash. Sreekrishna Sankar, who has just completed his Post Graduate Diploma in Management at IIM Bangalore, has come up with a list of tools that entrepreneurs can use in such times; most of this is free and freely available for use. Incidentally, Sreekrishna, and a couple of his batchmates at IIMB, Ajith Pai and Sahil Barua, have floated a firm Catalyst Ventures, which worked with a few start ups. Thanks for sharing this info, Sreekrishna.

... AND THIS VISION GAINED STRENGTH, AS GPS GREW STEP BY STEP



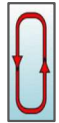
OVER THE YEARS ...

**WE'VE BEEN CREATING, &
IN SOME CASES, CURATING**

**VARIOUS BUILDING BLOCKS OF
THE CLIMATE SOLUTIONING PUZZLE**

WE'VE BUILT THE MOST SUCCESSFUL CAPTIVE FOOD WASTE TO BIOGAS PRODUCT ...

Patent 1: Stirring Mechanism



Convection currents based continuous stirring mechanism which avoids need for moving parts inside digester



Enzymatic hydrolysis, and proprietary monthly health capsule for better digestion and gas production

Patent 2: Automatic Titration

IoT based automated titration system which acts as data feeder for Biogas Bot

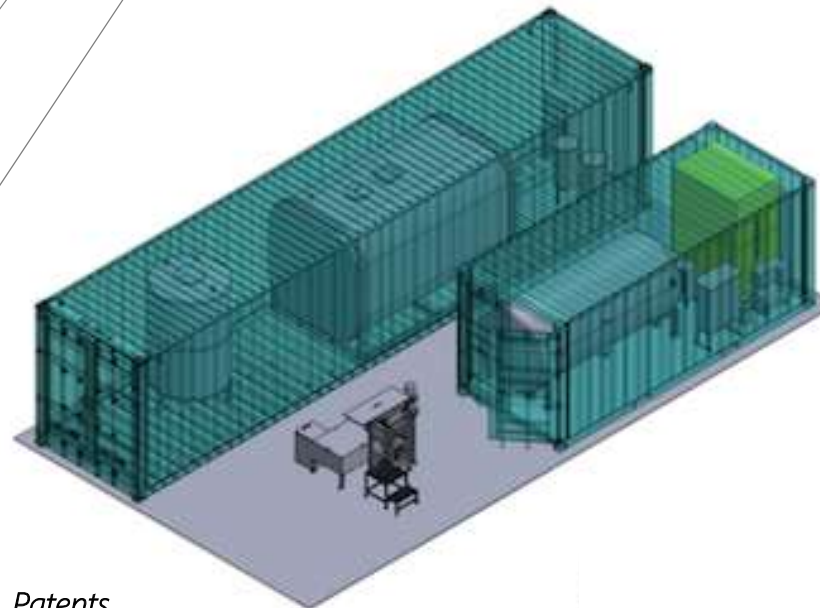
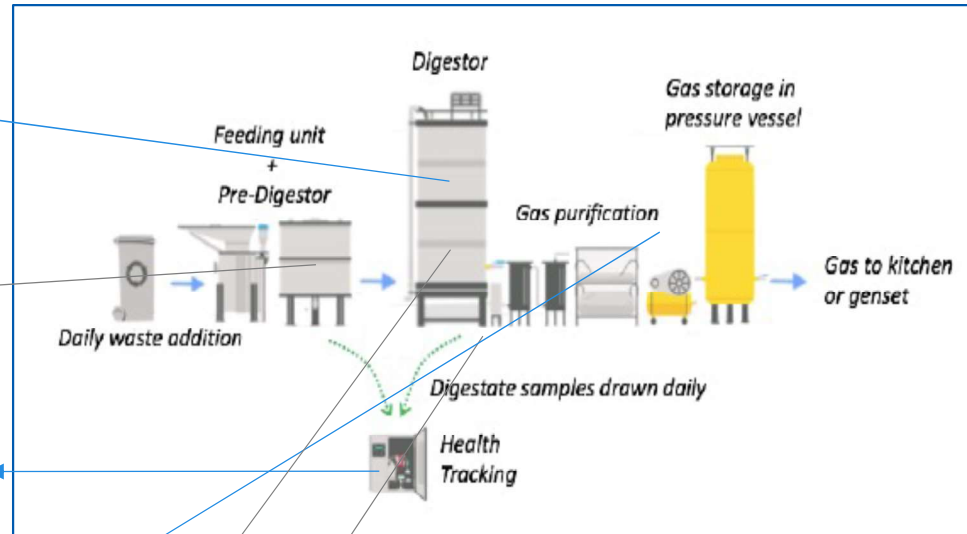
Patent 3: Auto-compression

Unique biogas compression system to optimize storage space, enables gas measurement and ensures apt gas pressure at application point



Robust temperature control module to avoid thermal shocks to bacteria which ensure stable and higher gas production

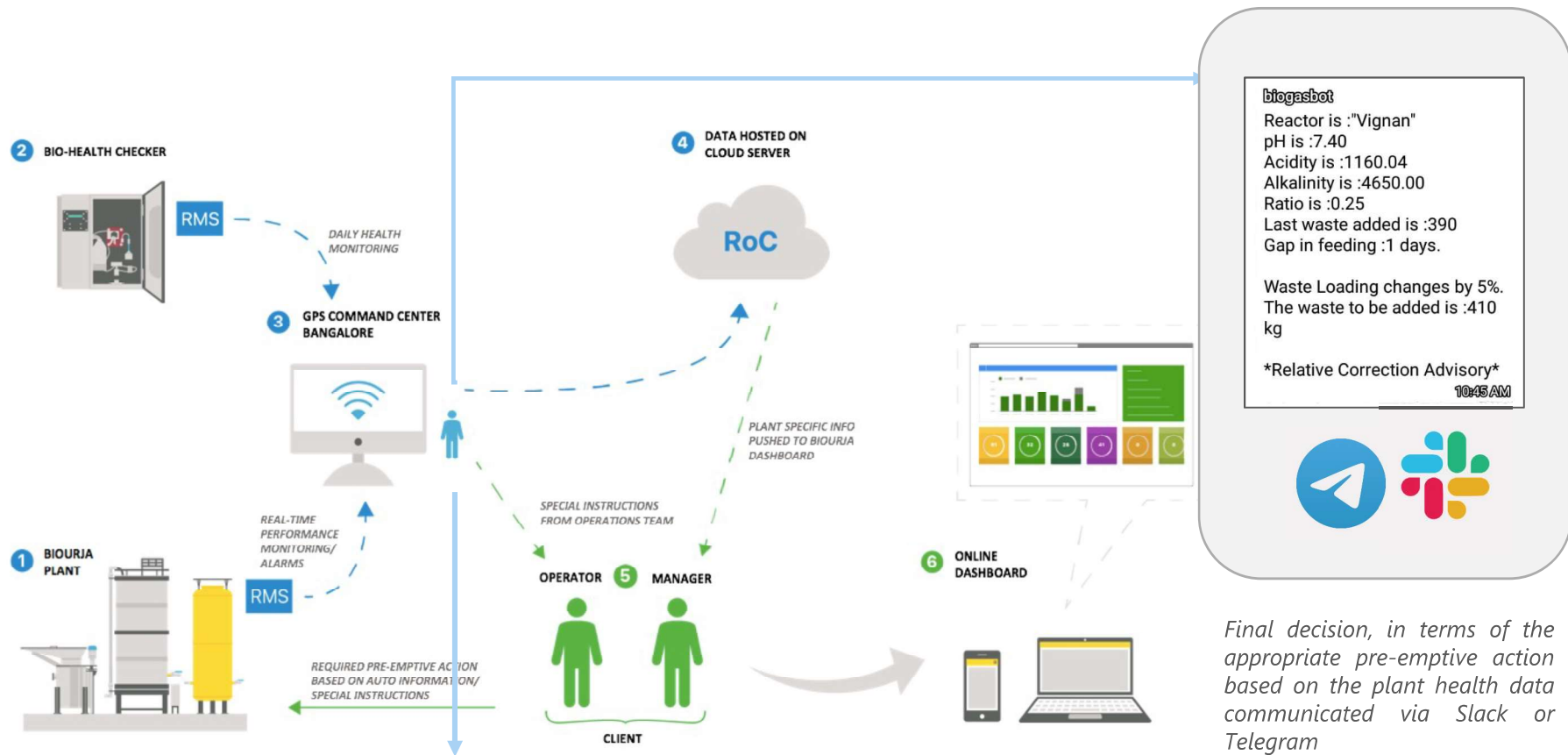
2-stage high-rate, high-solids biomethanation system



Patents



... POWERED BY AN ORIGINAL AI SOLUTION FOR REMOTE BIOHEALTH MONITORING



BiogasBot: GPS' Expert System, which mimics GPS' Operations Team and Founders in decision making

Final decision, in terms of the appropriate pre-emptive action based on the plant health data communicated via Slack or Telegram

Today, the BiogasBot helps the team manage the biohealth of ~ 100 operational biogas plants across South Asia, without the need for ANY technical personnel on the ground, or even at a centralized office.

WE HAVE BUILT & WE CONTINUE TO KEEP BUILDING A GREAT TEAM ...

Milind Patke, President

Prior to joining GPS, Milind was heading biofuels at BPCL as an Executive Director. He led the execution of BPCL's integrated 2G/1G ethanol bio refinery project at Odisha (Capex: INR 1,600 Cr), and coordinated procurement of 1G Ethanol for all OMCs. He has also played a key role in the shaping of MoPNG's SATAT policy.



Gomatam Ravi, Head, D&E

Ravi comes with over 3 decades of process engineering and EPC experience. Prior to joining GPS, Ravi led Shell's Gas Processing Division as General Manager, Asia Pacific region, followed by driving Shell Technology Centre's R&D initiatives, including the IH² pilot project. Ravi has also been with GE Plastics and EIL in the past.

Dr Dilip Ranade, Scientific Advisor, D&E

Dr. Ranade is one of the most respected figures in the bioenergy space, having taken Agharkar Research Institute to new heights as its Director. The World Bioenergy Association recognizes him as one of the leading global experts. His key contribution have been in the area of petroleum biotechnology and biomethanation



Mohit Gupta, Head, Project Incubation

Though critical, the incubation phase of any bioenergy project is an often neglected phase. Mohit comes with a rich experience in the same, having single handedly driven Spectrum Renewables' 2nd BioCNG project from incubation to commercial operations. Mohit's responsibility at GPS is to ensure every bioenergy project is managed with clockwork precision from Day 0!

Dr Sekhar Krishnan, Technologist, D&E

Dr Sekhar is a chemical engineer with over 3 decades of R&D experience, with expertise in effluent handling. Dr Sekhar Krishnan was the ex-Head of R&D (South Asia) at Suez (previously GE Water). Dr Sekhar's current focus is on custom designing ETPs for GPS' bioenergy projects.



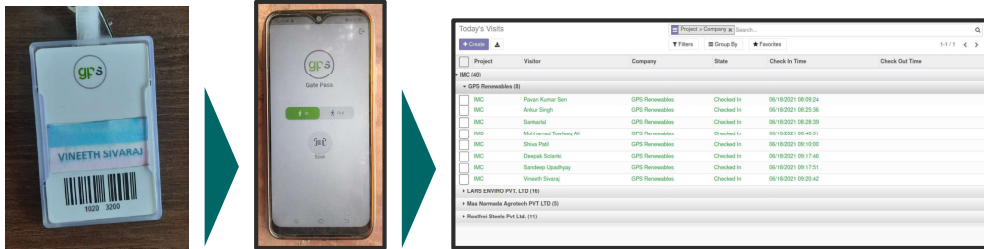
Sankalp Pathak, VP, D&E

Sankalp is a microbiologist with expertise in press mud cake and spentwash treatment. Sankalp has been associated with some of India's landmark bioCNG projects such as IOT Mabagas and Spectrum. He also holds a Masters in Data Science from IIIT Bangalore

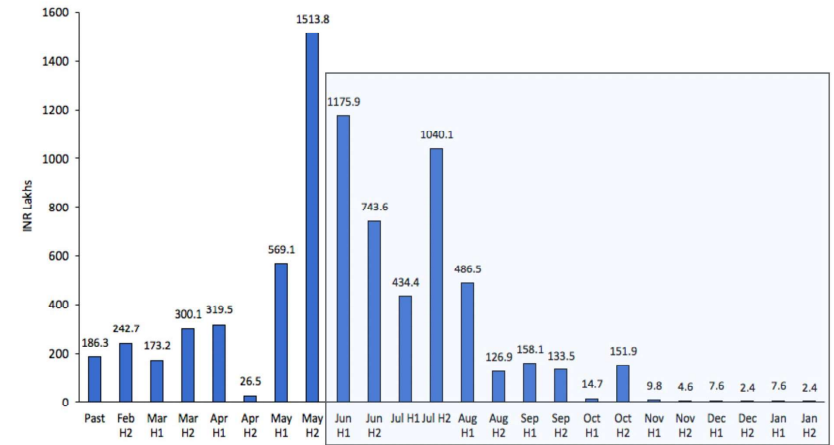
 *many more ...*

& CREATED OUR OWN SAAS SOLUTIONS TO EMPOWER OUR TEAM & PARTNERS DO MORE

GPS HSE Software

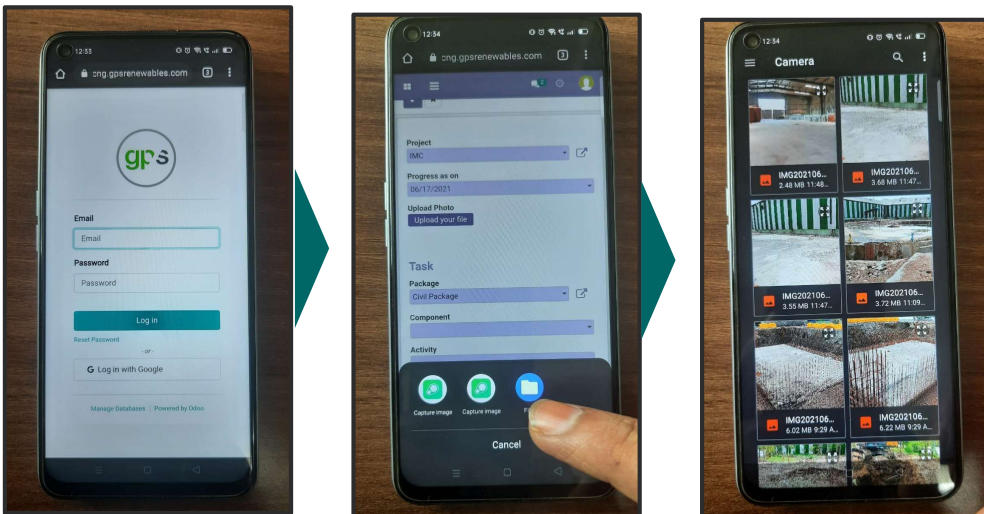


Access Card → Gate Access App → HSE MIS
 Incidents / hazards → HSE App → HSE MIS

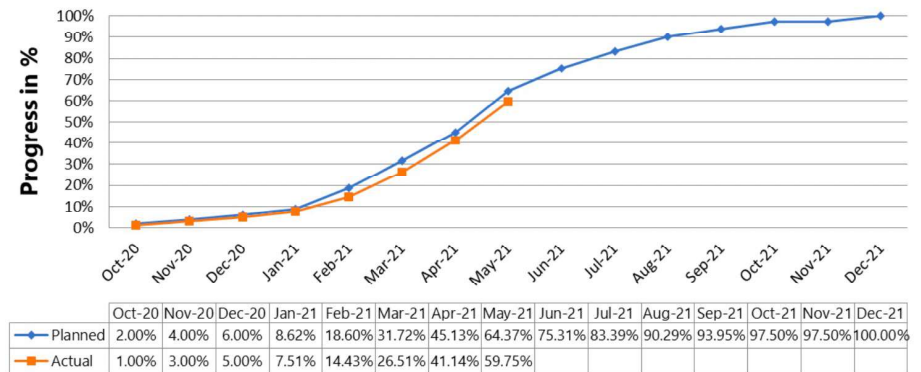


Weekly cashflow tracker is linked to the procurements module.
 Gives real time update of week wise cash requirements

GPS' Project Management Platform



Daily updates fed by the site engineer via a mobile to the PM MIS



Project S-Curve tracker that is updated automatically.
 Tied to GPS' project management software.

**OUR BABY STEPS TOWARDS
BIOENERGY PROJECT DEVELOPMENT**



WE JUST EXECUTED ASIA'S LARGEST SSO BASED BIO CNG PLANT ...

- India's (and one of the world's) largest SSO (source separated organics) based bioCNG plant
- Project highlights:
 - ✓ Location: **Indore**, India's cleanest city with near perfect source segregation
 - ✓ Model: **BOOT** Build-Own-Operate-Transfer
 - ✓ Project Developer: **EverEnviro** **
 - ✓ Capacity:
 - ✓ Input feed: 500 TPD
 - ✓ BioCNG output: 16-19 TPD
- Role of GPS: Turnkey EPC
- Timelines:



Feb 21: Issuance of PO



May 21

COVID 2nd wave



Aug 21

Shipping crisis

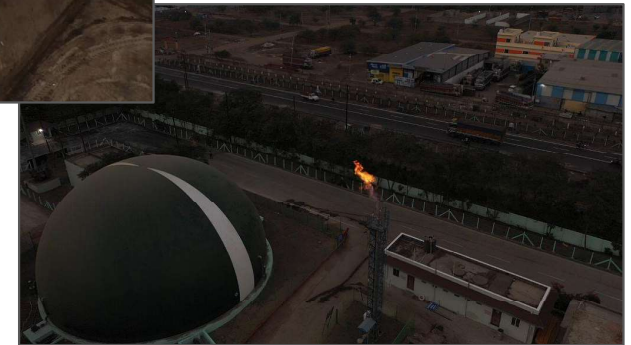
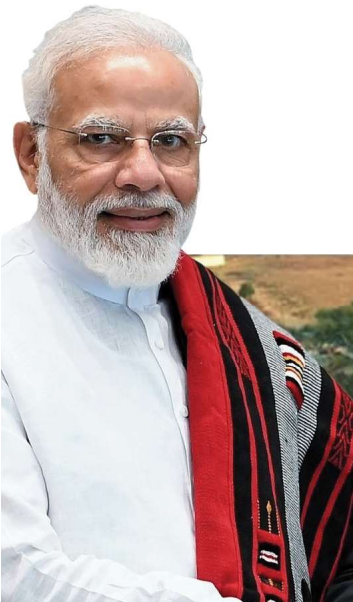
Record rains



Nov 21: Start of feeding



Jan 22: Start of dispensing



& ARE NOW INSTITUTIONALIZING BIOENERGY PROJECT INCUBATION

