

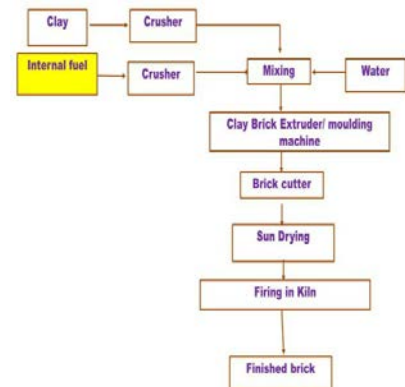
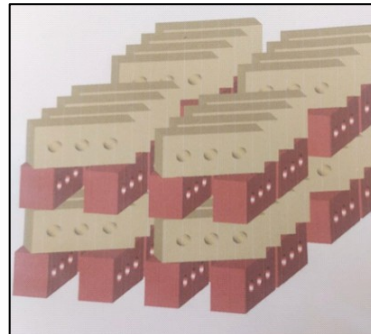
Production of Internal Fuel based low Carbon Footprint Burnt Clay Bricks with Criss-Cross Bricks Setting

Technology in Brief

Fuel cost in the brick sector is around 45-50% of the total cost. The use of internal fuel not only results in proper heating of bricks while firing but also reduces overall fuel consumption. By using this process/technology coal consumption can be reduced up to 30%, and will also significantly reduce the overall environmental impact. In internal fuel process, powdered fuel is mixed with clay prior to the moulding of bricks which serve as a fuel during firing. Cheaper fuels such as agriculture residue and industrial wastes may also be used as internal fuel.

Salient Features/Advantages

- Cheaper fuels like agriculture waste, bagasse, sawdust, boiler ash, pulverized reject-coal etc used as internal fuel.
- Internal fuel used reduces the requirement of external fuel partially or fully.
- Reduction in the use of clay >30%.
- Strength of bricks is more than conventional brick making process.
- Negligible emission of SPM & GHG.
- Process is cost effective, eco-friendly and energy efficient.



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| End Product(s) | Eco friendly and energy efficient Brick Kiln |
| License/Commercialization | 1) M/s Karma Bhatta Company, Baghat 2) M/s Surya Bhatta Company, Sonipath 3) M/s Om Prakash @ Sons Auto Clay Fire Bricks 4) M/s Sauga Bricks Pvt. Ltd., Baghat |
| TRL | 9 |
| Environmental Impact | Low carbon foot print |
| Setup - Equipment required | Brick extrusion machine, Internal fuel pulverizer, High RPM fan etc |

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| Linkedin Video Link | https://www.linkedin.com/posts/csircbri_sustainableconstruction-circulareconomy-claybricks-ugcPost-7463056077346025473-30E7?utm_source=share&utm_medium=member_desktop&utm_campaign=ACoAAD_9kj4B2jUfyt81pCfAlZ1Ld-pdHpEo7m4 |
| Youtube Video Link | https://youtu.be/QYWR24Jo32A?si=b4zW0DSQFIFfHlbi |