

Solidaridad

PROMOTING CIRCULARITY IN THE TAMILNADU LEATHER CLUSTERS FOR SOLID WASTE MANAGEMENT

**WASTE TO VALUE SUPPLY CHAIN
APPROACH TOWARDS SUSTAINABILITY**

—→ 2022 - 2025



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WHO ARE WE ?

Solidaridad is an international civil society organization with over 50 years of experience in developing solutions to make communities more resilient – from our early roots supporting repressed communities in Latin America to our current work fostering more sustainable supply chains and implementing innovative projects on the ground in Asia, Africa and Latin America, supporting smallholder farmers, workers, and miners. We envision a world in which all we produce and all we consume can sustain us while respecting the planet, each other and next generations.

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PROJECT LAUNCH ON 22nd JUNE 2022

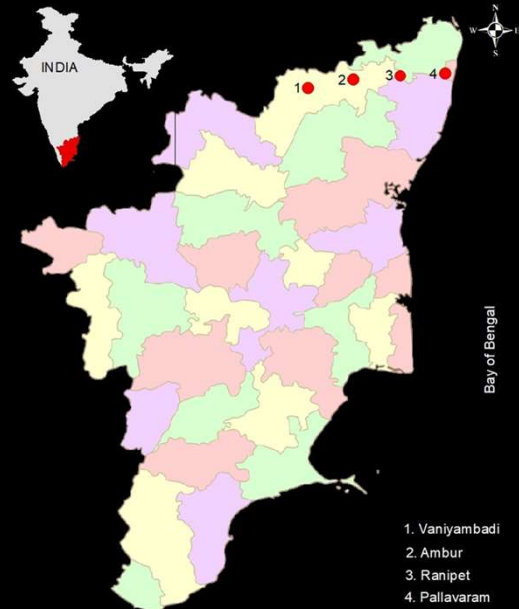
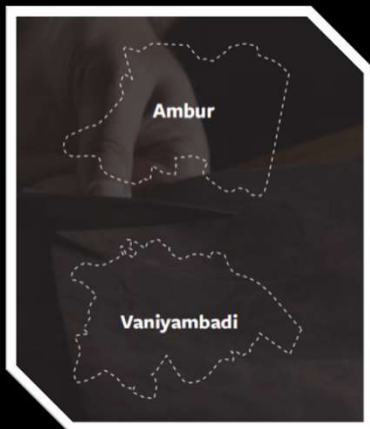
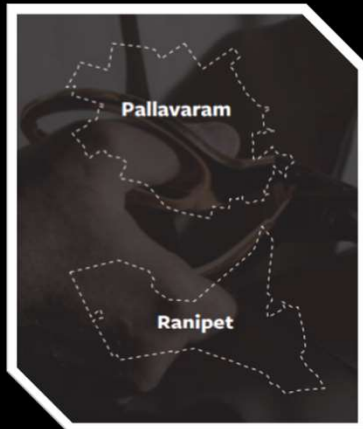


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Hon'ble Minister, Thiru Siva. V. Meyyanathan, Minister of Environment, Climate Change and Forests, Tamil Nadu and H.E Ugo Astuto, Ambassador of the European Union to India together launched the Project in the presence of H.E. Vincenzo de Luca, Ambassador of Italy in India, Ms. Supriya Sahu, Principal Secretary, Department of Environment, Climate Change and Forests and other dignitaries from leather fraternity

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PROJECT LOCATION



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WHY CIRCULARITY ?



RESOURCE EFFICIENCY



WASTE MANAGEMENT

LOWER CARBON FOOTPRINTS



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Leather Tanning Industry



Raw Hides And Skins



Finished Leathers

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SOLID WASTES FROM LEATHER CLUSTERS



Raw trimmings



Fleshings



Finished Trimmings



Sludge



Buffing Dust



Shaving dust



ZLD Salt



Trimmings

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AROUND 16000 TONNES OF SOLID WASTE IS GENERATED PER MONTH FROM FOUR CLUSTERS

SOURCE: BASELINE SURVEY, 2022

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CARBON FOOTPRINT OF SOLID LEATHER WASTE

Waste	CO ₂ kg/t
Putrefied hides / skins	624
Raw trimmings	624
Salt	624
Hair (pasting)	373
Lime sludge	455
Lime splits	624
Fleshing	624
Wet blue trimmings	221
Chrome splitting (bovine)	221
Chrome shavings	221
EI/crust shavings*	221
Buffing dust*	221
Dyed trimmings*	221
Sludge (35% dry matter)	455

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Waste to Fashion Products

The diagram shows the transformation of waste into fashion products. It starts with a pile of waste (shaving dust) on the left. An orange arrow points to a roll of grey eco-particle board in the middle. A green arrow points down to a finished green handbag on the right. Below this is a photograph of a retail display of various handbags made from these boards.

Eco-particle boards developed from shaving dust with REACH compliance

Products made from eco-particle boards

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Empowering women for a brighter tomorrow

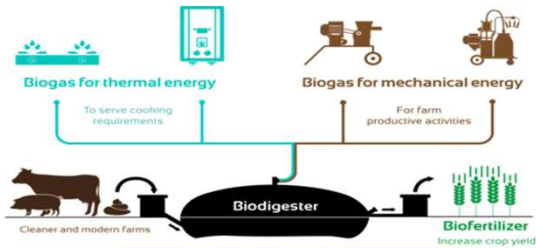


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Waste to Green Energy

2708 tons/month
fleshings generated



Bio gas Plant of 1 Tonn per day
capacity

Bio-methanation of leather fleshing
for electricity generation


1 TPD plant can generate -
40 to 60 cubic meter of biogas per day
which is equivalent to 40 to 60 KW of
electricity generated

14 **Fleshings to Tallow, Bio-Gas and Bio-manure**

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Waste to Value Products

Reutilization of Accumulated Salt



Thermal crystallization of ZLD salt for curing and pickling

Sustainable steps-Waste to Walk




Tannery Sludge to Paver blocks


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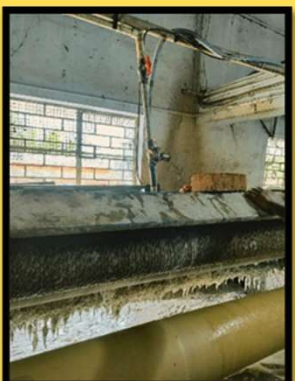
Water Efficient Technologies introduced in Tanneries



Smart Water Saving System



WaterLess Fleshing Roller



Solenoid Valve

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TOT for Sustainability Officers



Training of Trainers Programme on Process Optimization and Circularity

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Occupational Health & Safety Trainings



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Sensitization programmes on OHS and workers well-being

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**CHANGE THAT
MATTERS**