BURKINA FASO
MALI
~50°C / 122 °F

242 million

children around the world had their schooling disrupted by climate hazards in 2024*

Heatwaves were the #1 cause

**Learning interrupted Global snapshot of climate-related school disruptions in 2024, UNICEF*

The issue : families trapped in hot & costly housing



200 000

homes missing in Burkina Faso
+10% every year



3% / year

population growth



89%

of rural households build with metal sheets: heat, cost, imports



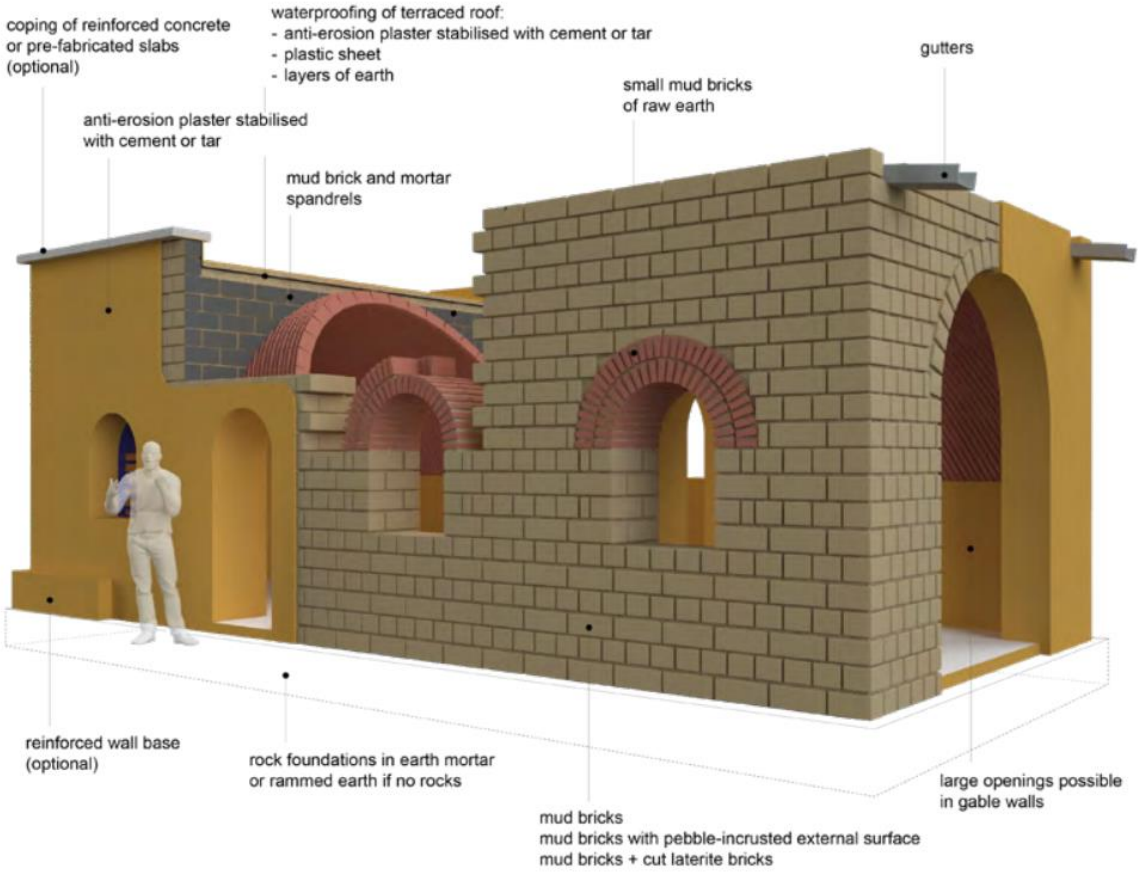
#2

import of Burkina Faso after fuel: building materials

Families don't lack the will, they lack the cash to build better in one go. And MFIs won't go alone into low and irregular incomes.


VIDEO · 45 s

ECONOMICAL - MODULAR - SCALABLE

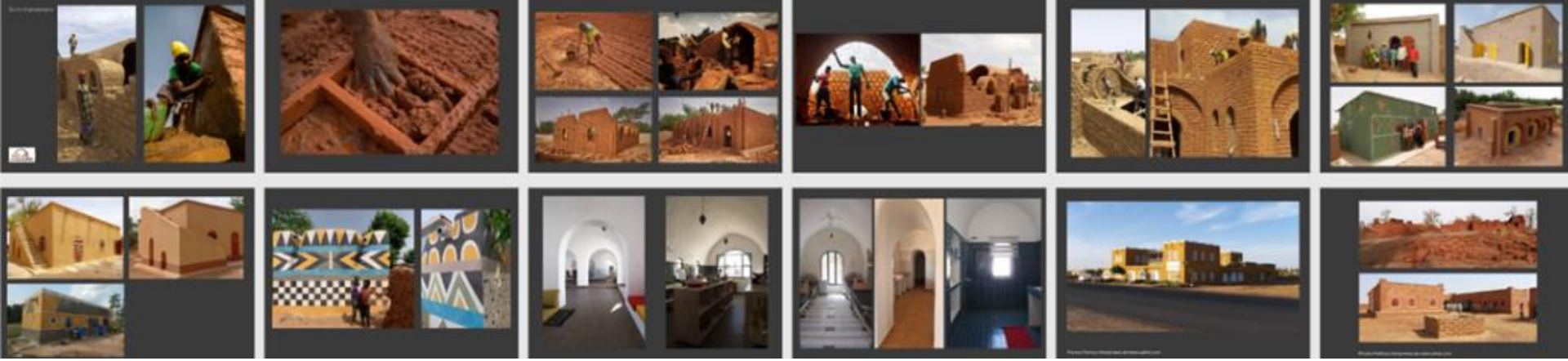


+/- 7°C
cooler inside

For more information, the stages and techniques of Nubian Vault construction are illustrated in a simple manner in the following document:

Nubian Vault Construction Stages and Techniques (FR)

+30 years
durability



Results

6
Countries

+104 000
People living / working in a vault

+8000
Buildings constructed

250 000
m2 built

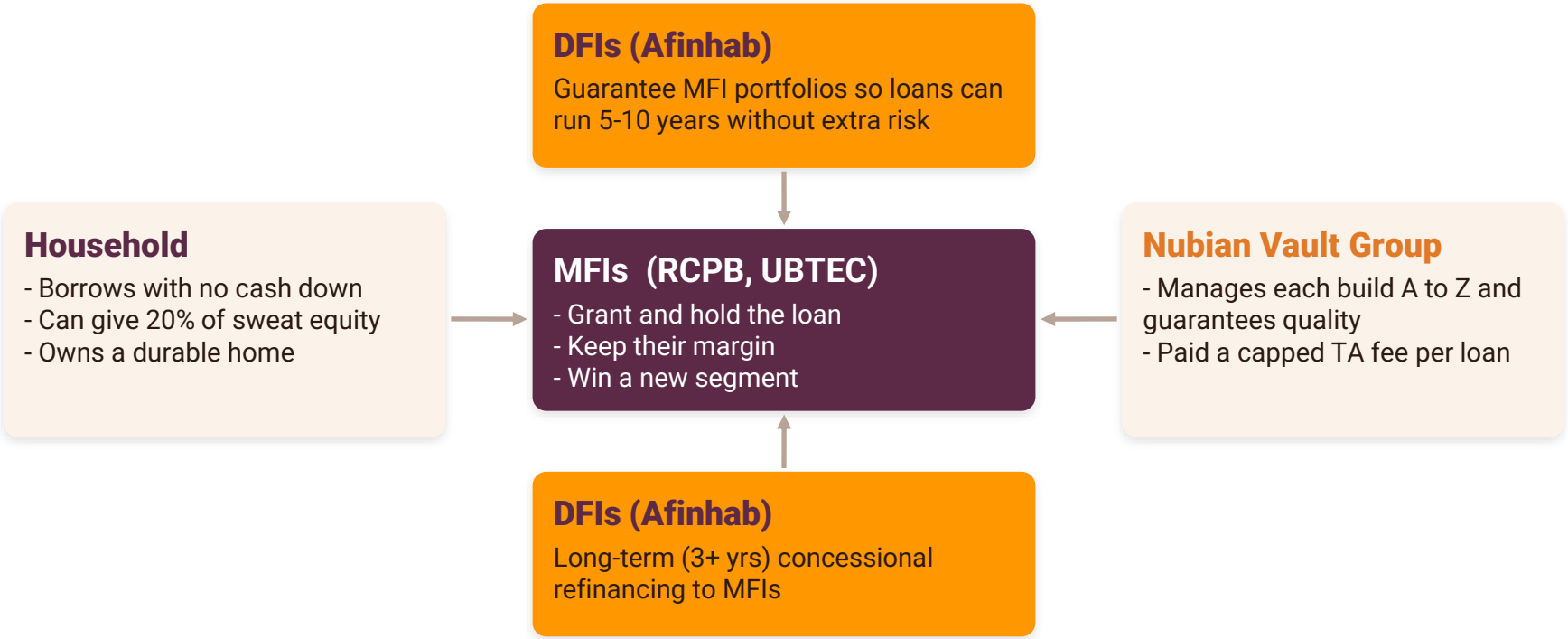
15%
Annual growth (last 10 years)

+4500
Trained Masons

1800
Localities with at least one vault

206 000
Tonnes of CO2 avoided (15t per NV over 30 years*)
*Methodology under certification

One home, two layers of finance



Homes sized to what families can repay

	Rural (F1) 25 m²	Peri-urban (F3) 60 m²
Home whole cost	2 880 $	12 800 $
Possible in-kind contribution	40%	~33%
Loan (incl. Nubian Vault TA)	1 870 $	9 230 $
Loan interest rate	8%	8%
Loan term (without guarantee)	48 months	48 months
Monthly instalment	40 $	190 $

Nubian Vault Group TA fee / peri-urban

508$
Excl. tax and capped

92$
FCFA margin per home

F1 rural

Rural vaults (25m2) - 1 living room + 1 bedroom - Staircase terrace








F3 periurban

Peri-uban vaults (60m2) - 2 bedrooms + living room + bathroom + kitchen + staircase terrace



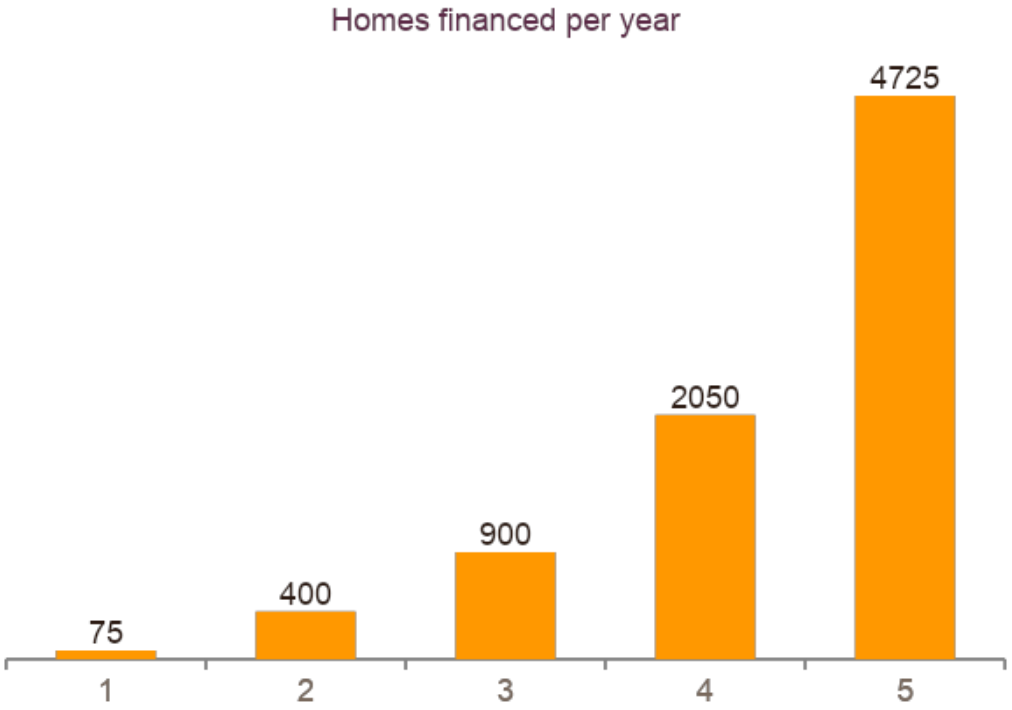








Our objective : 8,150+ homes financed in 5 years



31,62M $

housing loans issued by MFIs
2027 to 2031

2029

Our break even

WAEMU

8 countries + 1 currency + 1 MFI regulation ⇒ Benin next

What we need to achieve it

1

€270k

The priority = external financing for Nubika's working capital, 2027>2031

debt

and equity

2 **Diversification of portfolio guarantees**

Namely first-loss for rural housing

3 **Diversification of concessional refinancing**

At rates that keep household interest affordable

4 **EDGE certification**

MFIs need a guarantee more than cash. Our lead MFI has ample liquidity !

The impact is real

8,150
families owning a durable, shock-resilient home by 2031

21,500 t
CO_2 avoided at construction, 2027>2031

8,600 t/yr
CO_2 avoided every year of use after that



LA VOÛTE NUBIENNE

PROJECTION DE DÉPLOIEMENT EN AFRIQUE



PAYS ACTIFS

Mali · Burkina Faso · Sénégal · Ghana · Bénin

2026

745

VOÛTES CONSTRUITES

Sustainable housing, now affordable

The technique is proven.

The lenders are ready.

The families are waiting.

Help us make cool, durable homes affordable, starting now.

Judite Ferreira
Nubika (Nubian Vault Group)



Appendix

Backup slides for Q&A

Groupe Voûte Nubienne: structure

Vision: decent, resilient housing for people in the areas most exposed to climate change (extreme heat and drought).

Mission: build a viable, inclusive, low-carbon Nubian vault eco-construction sector serving the people and countries of West Africa.

AVN (non-profit)

Founded 2000. Standardised the technique and built the sector: mason training, standards, ministry relations, field partner

Solutions VN (for-profit)

Engineering firm (Côte d'Ivoire): studies and standard plans, project management support, technician training

Nubika (for-profit)

Housing finance: technical assistance services; financial engineering to unlock cash (blended finance with guarantees, refinancing)

Who wins what?

Each actor in the chain is paid, the key to scaling up

The bank / MFI

New rural customer portfolio

DFIs interest rates

Risk covered by warranty

Gateway to other products

The rural clientele is underbanked. NV is a leading product to other financial services. Banks and MFIs are expected to focus on rural areas (rising bonds in West Africa)

The mason

Income from construction sites

Autonomous business (for referent craftsmen)

Training + AVN Certification

NUBIKA

Technical Support Billing

…allowing the structuring of the market

Income from carbon credits to reduce cost supported by clients

MicroBuild Fund Reference

Facility Habitat for Humanity / Symbiotics: MFI financing (€100 million round 1 > €350 million round 2) for affordable housing. The home portfolios posted higher repayment rates than other credit segments. Nubika adapts this model to West Africa and for decent and resistant housing.

Nubian vault vs. conventional housing

Criterion	Metal sheet + concrete	Nubian vault
Total build cost (small rural home, 25 m²)	~€1,800–2,500	**~€1,900–2,600**
Self-build share	Low	**20% to 80%**
Estimated energy savings	None	**€263 / year (55 m² vault)**
Durability without major upkeep	10–15 years	**30+ years, proven**
Imported materials	Yes (metal sheet, cement)	**No — 100% local**
Thermal comfort	Very hot	**Excellent (about −7°C)**
CO_2 emissions (construction)	High	**Very low**

A proven market in dry climate zones

15% / yr
growth of Nubian vault construction (last 10 years)

~450M
people in West Africa (2024)

2.7% / yr
average population growth, West Africa

A market of

10,000

vaults per year in West Africa

Demand exists. Now the vault must become financially accessible and economically viable.

Nubika secures every housing loan, A to Z

1

Prepare

Match client with a trained mason from the network; check the plot and materials

2

Monitor

Site visits, supervision of all parties, quality control at each disbursement

3

Guarantee

Build quality of the home

4

Hand over

Train the family in maintenance and carbon monitoring

Nubika charges a flat fee per loan, paid by the borrower and deducted from the first repayments.

Peri-urban home: 54,000 FCFA margin

TA price, excl. tax

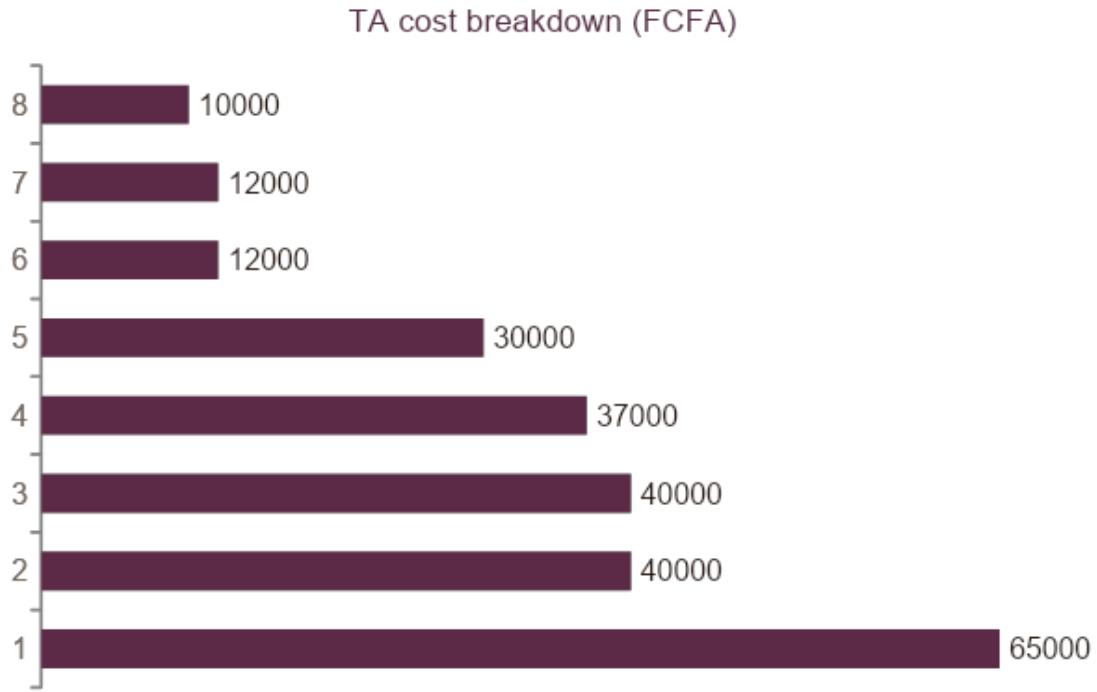
300,000 FCFA

Cost price

246,000 FCFA

Margin per home (≈ €82)

54,000 FCFA



*1 claim of 600,000 FCFA every 20 builds (5%)

Rural home: 12,900 FCFA margin

TA price, excl. tax

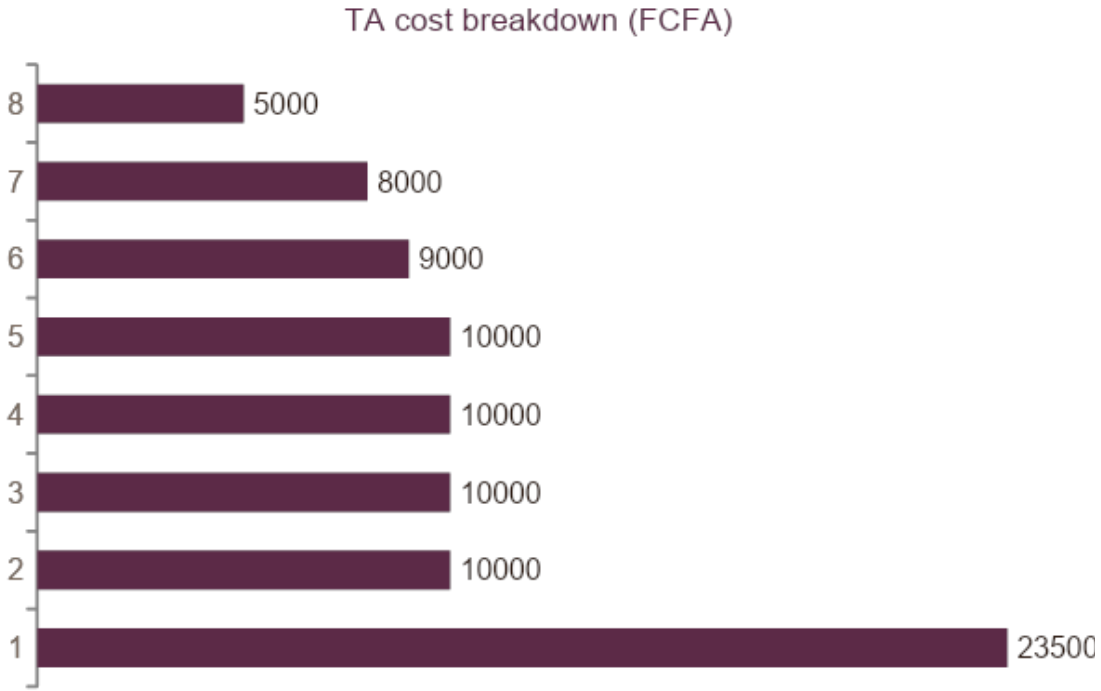
98,400 FCFA

Cost price

85,500 FCFA

Margin per home (≈ €20)

12,900 FCFA



Financial projections

€ thousands	2027	2028	2029	2030	2031
Homes financed (no.)	75	400	900	2,050	4,725
TA revenue	34	122	258	553	1,201
Margin on TA	6	20	43	90	193
Overheads	7	22	40	73	86
Net result	**−1.8**	**−3.3**	**+0.1**	**+11.2**	**+72.4**

From 2028, the team grows with volume. Rural: 5,075 homes · Peri-urban 40 m²: 2,153 · 60 m²: 923 (2027–2031).

Financing need: working capital

€ thousands	2027	2028	2029	2030	2031
External financing needed in year	14	28	39	75	115
Working capital, year-end (stock)*	10	36	76	161	348

Over 5 years, working capital reaches €348k, of which €270k is financed externally (ideally €189k debt and €81k equity). The rest comes from Nubika's own cash flow, positive from 2029, and GVN's capital contribution.

*Working capital comes from the gap between costs incurred during the build and TA collected from the first repayments.

Nubika

Sustainable housing, now affordable

Blended and carbon-backed housing microfinance for low-carbon Nubian vault homes

Judite Ferreira · Nubian Vault Group

