

Clean Energy
MIGRATION TO THE FREE ENERGY MARKET AS AN ACTION FOR
INSTITUTIONAL AND ENVIRONMENTAL SUSTAINABILITY

L. FERREIRA¹, F. MINGRONE² and L. BUSE²
1.National Institute for Social and Human Development , São Paulo, Brazil



INTRODUCTION

The National Institute for Social Human and Development is responsible for managing public health units and within its strategic guidelines, seeks to implement sustainable practices both in the environmental and institutional spheres.

AIM

The migration to the free energy market represents an opportunity to reduce greenhouse gas emissions, as well as optimizer costs. However, adopting this practice involves challenges related to regulatory compliance and the need for initial infrastructure investments.

RESULTS

ENERGY AWARENSESS - analisys na parameters Jan23 - Jan 24							
	CIR	Jean Bitar	HMUE	Breves	Tailandia	Caetes	Consolidado
Tariff type	A4_VD	A4_VD	A4_AZ	A4_AZ	A4_VD	A4_AZ	
Ideal powe factor: 0,92	0,91	0,9	0,92	0,89	0,89	0,92	0,91
Peak consumption / demand	200.477,91	446.621,25	1.972.216,09	913.165,84	502.224,27	914.098,20	4.948.803,56
Off-peak consuption / demand	815.318,35	709.344,34	2.873.969,11	1.205.461,24	764.867,19	1.470.154,18	7.839.114,42
Reactive consumption	2.655,03	8.922,36	3.522,76	23.599,19	11.601,92	50,87	50.352,14
Peak overrun			203.930,99			34.585,12	238.516,11
Off-peak overrun			7.451,99	2.694,44		43.870,20	54.016,63
Taxes and fees	31.507,63	28.539,56	31.074,32	28.940,68	29.069,54	31.646,61	180.778,34
Compensation cancellation	0,00		-245.121,88				-245.121,88
Total Invoice	1.049.958,93	1.193.427,51	4.847.043,38	2.173.861,39	1.307.762,93	2.494.405,18	13.066.459,32
Source: compiled hospital energy invoices							
FREE ENERGY ESTIMATE							
Total peak and off-peak consumption/demand	1.015.796,26	1.155.965,59	4.846.185,20	2.118.627,08	1.267.091,46	2.384.252,38	12.787.917,98
30% reduction due to migration	304.738,88	346.789,68	1.453.855,56	635.588,12	380.127,44	715.275,71	3.836.375,39
Total consumption/demanda with discount	711.057,38	809.175,91	3.392.329,64	1.483.038,95	886.964,03	1.668.976,67	8.951.542,58
Penalties	2.655,03	8.922,36	214.905,74	26.293,63	11.601,92	78.506,19	342.884,88
Taxes	31.507,63	28.539,56	31.074,32	28.940,68	29.069,54	31.646,61	180.778,34
Estimated total	745.220,05	846.637,83	3.638.309,70	1.538.273,27	927.635,49	1.779.129,47	9.475.205,80
Reduction in \$	304.738,88	346.789,68	1.208.733,68	635.588,12	380.127,44	715.275,71	3.591.253,51
Reduction in %	-29,02%	-29,06%	-24,94%	-29,24%	-29,07%	-28,68%	-27,48%

METHOD

A descriptive and exploratory research was conducted with the aim of examining the transition to the free energy market and the financial and environmental impacts of this migration on hospitals managed by INDSH in the state of Pará. The sample included six hospitals that were under the same energy distributor's concession, ensuring homogeneity in contractual conditions. Data collection was carried out through interviews with hospital managers, as well as a document analysis of energy invoices, consumption records, and related contracts. Additionally, a negotiation process with clean energy suppliers was conducted, considering criteria such as cost, reliability, renewable sources, and commitment to sustainable practices. The migration process followed the guidelines established by ANEEL's Normative Resolution 1.000/2021, which details the mandatory steps for contracting energy in the free market.

CONCLUSIONS

The study demonstrated that the transition to the free energy market, through the adoption of renewable sources, represents an effective strategy for healthcare institutions seeking long-term economic and environmental sustainability. However, the commitment to clean sources provides greater predictability in energy costs, significantly contributing to the reduction of operational expenses and the mitigation of environmental impacts associated with energy consumption.

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CONTACT INFORMATION

Luciani Ferreira
National Institute for Social and Human Development
qualidade.sede@indshsaude.org.br;
luciani.a.ferreira@gmail.com