

The energy review is the input to everything else in an EnMS, and the significant energy use test is where most reviews go wrong — an SEU list drawn from intuition rather than measured data cannot support a defensible baseline. The criterion used here is stated in the column header rather than assumed, which is what an auditor asks for first.

REF	AREA OR SYSTEM	ENERGY SOURCE	ANNUAL CONSUMPTION (GJ)	% OF SITE TOTAL	SEU? (CRITERION: >=10% OF TOTAL OR MATERIAL IMPROVEMENT POTENTIAL)	RELEVANT VARIABLES	BASELINE PERIOD	BASELINE VALUE	ENPI (NORMALISED)	OWNER	IMPROVEMENT OPPORTUNITY IDENTIFIED	CLAUSE
ER-01	Refrigeration - chilled and frozen storage	Electricity	18400	31.2%	Yes - largest single use	Ambient temperature (CDD); pallet throughput; door-open events	FY2024-25 (12 months)	18,400 GJ	GJ per 1,000 pallets stored per CDD-adjusted month	Engineering Manager	Floating head pressure control; strip curtains on two docks; night setback on ripening rooms	6.3, 6.4
ER-02	Process steam - cook and CIP	Natural gas	15900	27.0%	Yes - largest thermal use	Production volume (tonnes); product mix; CIP cycle count	FY2024-25 (12 months)	15,900 GJ	GJ per tonne of finished product	Production Manager	Condensate return currently 41% - recovery to 75% is the single largest thermal saving	6.3, 6.4
ER-03	Compressed air	Electricity	6800	11.5%	Yes - meets consumption criterion	Production hours; leak load; number of lines running	FY2024-25 (12 months)	6,800 GJ	GJ per 1,000 production hours	Maintenance Supervisor	Leak survey overdue by 19 months; measured off-shift baseload is 34% of running load	6.3, 6.4
ER-04	Packaging hall - motors and conveyors	Electricity	5200	8.8%	No - below threshold, low variance	Line running hours; product changeover count	FY2024-25 (12 months)	5,200 GJ	GJ per 1,000 cases packed	Packaging Supervisor	VSD retrofit assessed - payback 7.4 years, not prioritised this cycle	6.3
ER-05	Space heating and cooling - offices and amenities	Electricity	3100	5.3%	No - below threshold	HDD and CDD; occupancy	FY2024-25 (12 months)	3,100 GJ	GJ per m2 per degree day	Facilities Manager	BMS schedule runs 05:00-19:00 against actual occupancy 06:30-17:00	6.3
ER-06	Lighting - production, warehouse, external	Electricity	2700	4.6%	No - below consumption threshold, but flagged for improvement potential	Operating hours; daylight availability	FY2024-25 (12 months)	2,700 GJ	GJ per 1,000 operating hours	Facilities Manager	Warehouse high-bay still metal halide; LED retrofit payback 2.1 years	6.3
ER-07	Wastewater treatment - aeration	Electricity	2400	4.1%	No - below threshold	Effluent volume; organic load (COD)	FY2024-25 (12 months)	2,400 GJ	GJ per ML effluent treated	Environment Coordinator	Dissolved-oxygen control is manual; automated DO trim assessed as viable	6.3
ER-08	Site vehicles and forklifts	Diesel / LPG	1900	3.2%	No - below threshold	Pallet movements; shift pattern	FY2024-25 (12 months)	1,900 GJ	GJ per 1,000 pallet movements	Logistics Manager	Electric forklift trial deferred pending charging infrastructure assessment	6.3
ER-09	Air handling - production hygiene zones	Electricity	1700	2.9%	No - below threshold	Production hours; outside air temperature and humidity	FY2024-25 (12 months)	1,700 GJ	GJ per production hour	Engineering Manager	Filter differential pressure not trended; fan energy penalty unquantified	6.3
ER-10	Boiler house auxiliaries and pumping	Electricity	900	1.5%	No - below threshold	Steam demand; boiler firing hours	FY2024-25 (12 months)	900 GJ	GJ per GJ steam raised	Engineering Manager	Feedwater pump runs at fixed speed against a modulating load	6.3
SITE TOTAL		All sources	59000	100%	3 SEUs identified, covering 69.7% of site energy		FY2024-25 (12 months)	59,000 GJ	GJ per tonne of finished product (site-level EnPI)	Energy Manager	Energy review to be updated at defined intervals and after any major process change	6.3, 6.4, 6.5

Free to use and adapt. This template is published in full by [Aegentra Academy](https://aegentra.com.au/academy), an official PECB authorised training partner in Australia. Get the rest of the set and the course it accompanies at aegentra.com.au/academy/iso-50001-lead-implementer.