



5 March 2026

Market Transformation Advisory Board (MTAB) Meeting

CalMTA is a program of the
California Public Utilities
Commission and is administered
by Resource Innovations.

Agenda



Time	Agenda Item	Presenter
1:00 p.m.	Welcome, Introductions & Agenda	Stacey Hobart
1:10 p.m.	COI Declarations & Review of Draft MTAB Notes from Jan. 29 MTAB Meeting	Stacey Hobart
1:20 p.m.	Commercial Rooftop Units: Appendix I Feedback Themes and Updates to MTI Plan	Rick Olson-Huddle
1:50 p.m.	Revised Induction Cooking MTI Plan Update: TSB & Cost-Effectiveness	Elaine Miller & Karen Horkitz
2:30 p.m.	Break (15 min.)	Break (15 min.)
2:45 p.m.	2026 Operations Plan & Budget	Lynette Curthoys & Jim Giordano
3:45 p.m.	Public Comment	Public Comment
3:55 p.m.	Next Meeting & Next Steps	Stacey Hobart
4:00 p.m.	Adjourn	

Icebreaker

2. COI Declarations & Review of Draft MTAB Meeting Notes

Stacey Hobart | Principal of
Engagement & Communications



MTAB declaration of COI

MTAB eligibility

- Can't receive funding from CalMTA or be in pursuit of funding

Recusal requirements

- Can't bid on RFP/RFQ if giving input after Phase I
 - Nearly all ideas under development are now in Phase II or III
- Those with competitive interest can recuse themselves from discussion, but must leave MTAB if responding to RFP
- Agree to not influence remaining MTAB members
- Interpretation, if needed, done by CPUC staff

Transparency

- Public meetings and process where COI concerns can be raised by the public



CalMTA COI policies



- The CalMTA program has robust COI policies to ensure decision-making is transparent, impartial, and unbiased.
- The Resource Innovations team that administers CalMTA has deep experience implementing market transformation and other energy efficiency programs in California and throughout North America.
- Resource Innovations employees and subcontractors who function in decision-making roles for CalMTA are firewalled from any ongoing work with California utilities or other covered entities and sign COI certifications.
- CalMTA seeks CPUC approval when there is a need to draw on specialized expertise from subject matter experts who also support work with covered entities.



MTAB meeting notes



Draft MTA meeting notes

January 29, 2026

3. CRTUs: MTAB Feedback Themes and Updates to MTI Plan

Rick Olson-Huddle,
Strategy Manager



MTAB feedback overview

Common themes from 120 MTAB comments:

1. Avoid mandating specific technologies
2. Address cost and end-user economics
3. Acknowledge uncertainties about contractors & CCC
4. Be clearer and more precise (definitions, tiers, vision)

Theme 1: Concerns over prescriptive technology



MTAB comments

Concern about mandating variable-speed compressors

CalMTA responses

Revised Tier 3 definition to not specify variable-speed compressor

New Tier 3 definition:

- Tier 1 (CCC) **plus**
- Tier 2 (20%+ cooling) **plus**
- Variable-speed supply fan

Confirmed Tier 2 aligns with CEE "Advanced Tier" specs

Theme 2: Cost & customer economics



MTAB comments

Cost is the dominant barrier, especially in the unplanned replacement market

Concern that customer bill impacts, especially gas-to-electric conversions, could deter adoption

CalMTA responses

Highlighted Tier 1 / CCC as low-cost, high-value

Revised Tier 3 to be less prescriptive/ less expensive.

Clarified most users will see utility bill savings but acknowledged one case of negative bill impacts with current energy models

Theme 3: Contractor & CCC uncertainties



MTAB comments

Uncertainty about contractor adoption of CCC

Smaller contractors may lack capacity for remote monitoring and ongoing service models

Risk that automated fault detection & diagnostics (AFDD) features are unused

CalMTA responses

Demonstration project - 150 RTUs - will be the proving ground for CalMTA understanding the contractor value

Recognized that not all contractors must adopt CCC for MTI success

Partial fault response still yields benefits

Theme 4: Clarity in definitions



MTAB comments

Confusion between CRTU vs. RTU, "advanced" vs. "efficient"

Tier requirements (especially Tier 3) initially described too loosely

Vision statements and "market end-state" seen as vague

CalMTA responses

Added clearer CRTU definitions, glossary updates, and earlier footnotes

Clarified tier hierarchy and when tiers build on one another

Revised vision language, including a quantified market end state
(CRTUs >30% of sales)

MTAB encouragement



"I appreciate that strategic interventions for environmental and social justice communities are outlined in section 2.5."

Cyane Dandridge & Stephen Miller, SEI

“ I have reviewed the documents and am in general support. I see responses to comments that I have made previously in the development process and want to commend the team for being responsive to MTAB input and feedback.”

Jeff Harris, NEEA

Questions & Discussion

4. Revised Induction Cooking MTI Plan Update: TSB and Cost-effectiveness

Elaine Miller, Senior Strategy
Manager

Karen Horkitz, Market Research
and Evaluation Lead



D.25-11-023 CPUC decision re: induction



OP 1: "...The MTI for Induction Cooking is **conditionally approved**, subject to CalMTA's submission of a Tier 2 advice letter by no later than April 3, 2026 that does the following:

- a) Narrows the Induction Cooking MTI **focus to 120 Volt technologies, with or without battery backup**;
- b) Related to the narrower technology focus, specifies changes to the **logic model, intervention strategies, market progress indicators, milestones, and cost-effectiveness forecast and schedule**;
- c) **Modifies logic model** to account for **market and policy environment changes** since the MTI was developed; and
- d) **Modifies the MTI deployment budget** to reflect the narrower technology focus and discusses how changes related to items (a), (b), and (c) above are reflected in the budget revisions."

Also calls for a six-year initial budget authorization verses the original five-year.

Shift in strategy impacts outcomes



Because of greater focus on a more affordable 120V product (without battery), this results in the following benefits:

- Accelerates market availability of more affordable 120V options
- Increases expected portion of benefits that will go to ESJ / MF communities
- Enables simplified gas conversions to electric

But there are trade-offs:

- Need to now engage with two distinct market segments: 120V with battery and 120V without battery, both in early market development phase
- Reduces uptake of 240V products because of change in focus, which slightly reduces TSB and overall adoption of efficient products over the 20-yr program period.

Overall drivers of strategy change on budget



- Focus on 120V, which is an emerging technology (non-battery-enabled and battery-enabled), effectively **2Xs our supply chain engagement**
 - **Increases by \$2M, mostly in early implementation years**
- Refocus on 120V results in less focus on 240V products. This **removes retailer incentives for 240V** and pushes out retail introduction of 120V products; also results in **removal of builder incentives**
 - **Declines by \$2.4M, mostly in early implementation years**
- **Awareness-building** still required but costs delayed somewhat and consequently reduced. Will be less broad marketing and more targeted towards 120V products and multifamily
 - **Declines by \$2.4M and spend is pushed out into later years**
- **Overall, also extends active market interventions into a seventh year**

Overall MTI budget summary

Budget description	New budget	Change and rationale
Phase II investment (2024-2026):	\$4,626,000	Increased by \$632,000 to reflect additional time/effort required to revise plan and continue market engagement
Phase III investment over initial CalMTA funding cycle (2026-2031, six years):	\$29,672,000	Updated to six years (2026-2031) and remains below the Decision cap of \$32,399,000 . Reflects the revised strategy of focus on 120V products and 2x of manufacturer engagement, and de-emphasis on 240V products with builders and retailers
Phase III investment in remaining years of the MTI (2032-2045)	\$2,267,000	Because of the refocus on the 120V product, a product in early development, extended implementation out into a seventh year
Total evaluation budget	\$2,529,000	Remains the same but is also pushed out to begin in 2027
Total Phase III investment (implementation + evaluation)	\$34,468,000	
Total MTI cost (Phase II + Phase III) needed to achieve TSB forecast	\$39,094,000	The total investment needed to achieve the 20-year TSB forecast increased from \$37,427,000 to \$39,094,000 .

Reforecasting approach



Market adoption

- Update forecast to include 120V battery *and* non-battery
 - Adoption of 120V non-battery will start more slowly than battery-enabled because product not yet available, but will gain momentum after 2030
 - Focus on non-battery product will reduce adoption of other induction products, but will result in net increase in 120V fuel substitution (i.e., gas-to-electric purchase decisions)

Incremental measure cost

- Update incremental measure costs for 120V products;
 - Blended average equipment price is lower than 120V battery-enabled alone

Cost-effectiveness

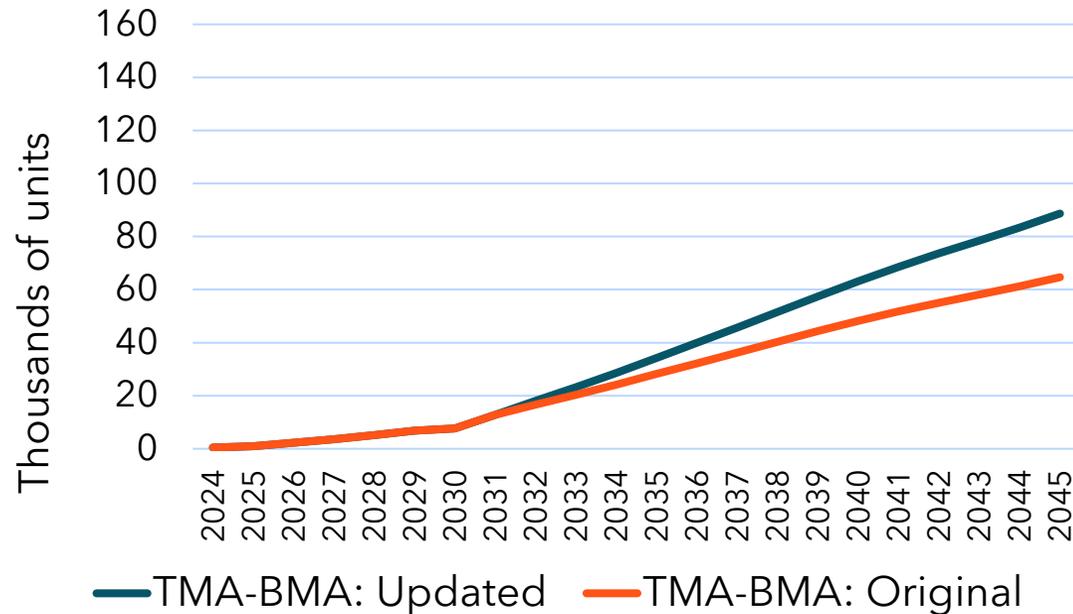
- Update TSB, TRC, and PAC based on revised input

Annual incremental adoption

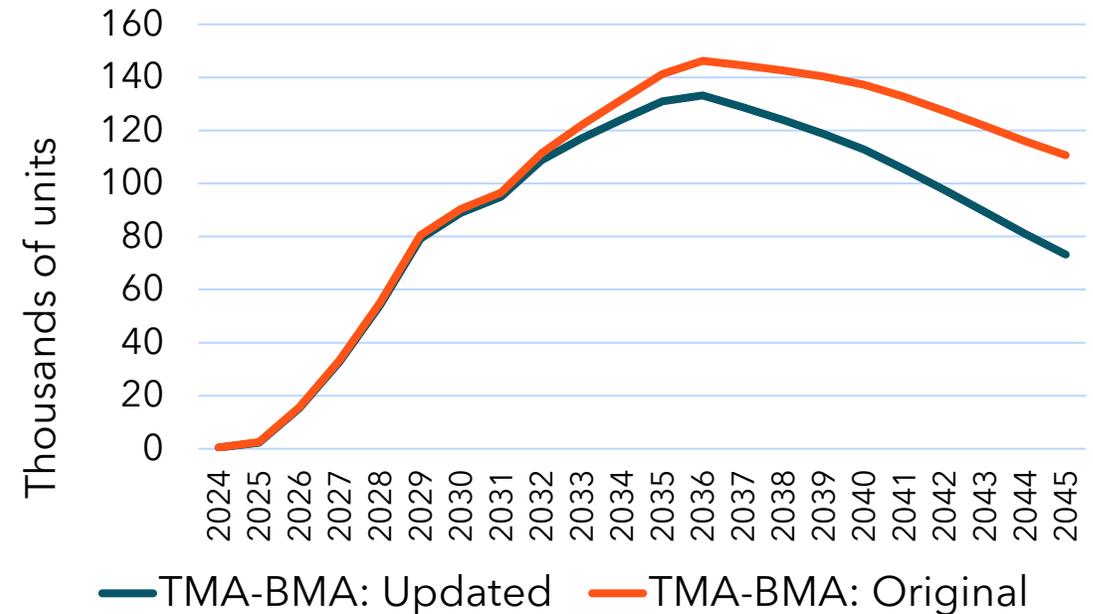


Original vs. updated annual market adoption across all segments

120V Induction Products



240V Induction and E* Products



Original vs. updated market adoption forecast



120V induction products

- 28% **increase** in incremental adoption
- 173k incremental units: 64% battery; 36% non-battery
 - Battery-enabled units decrease by ~10%

240V efficient products (induction and ENERGY STAR radiant)

- 13% **decrease** in incremental adoption
- -288k incremental units)

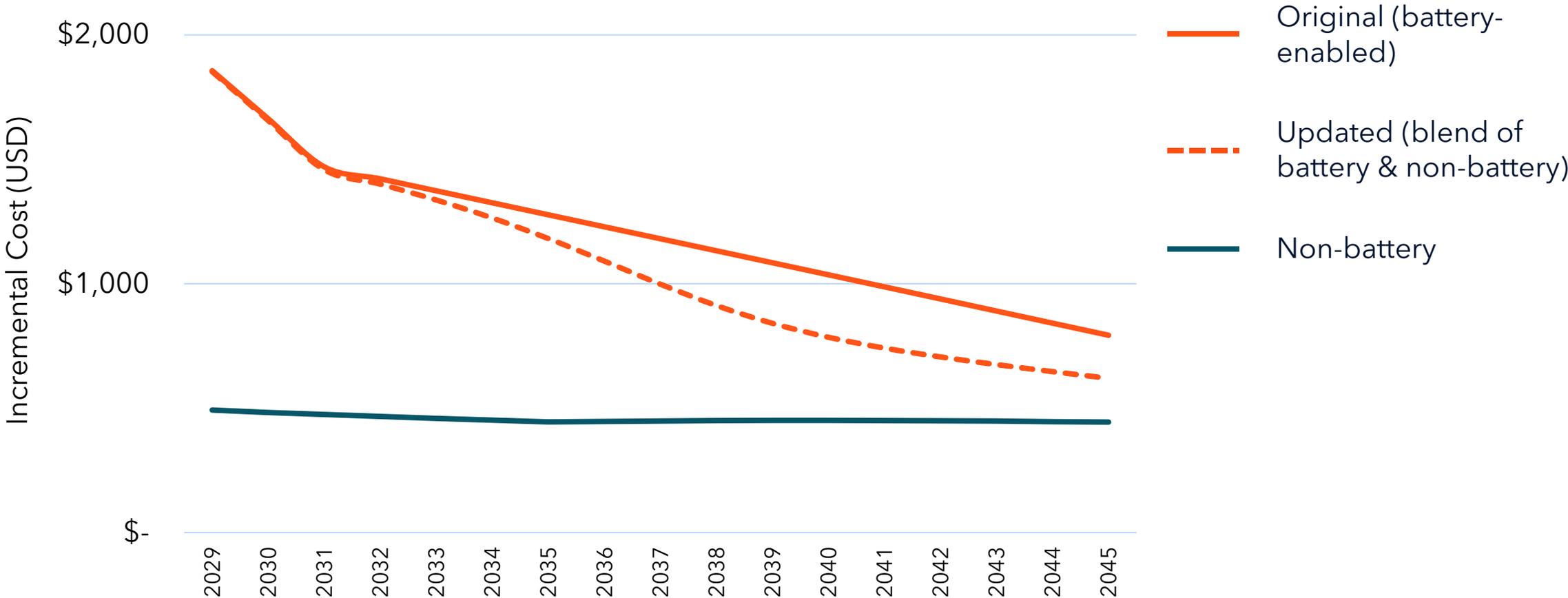
Overall Change

- 4% **decrease** in incremental adoption
- -115k incremental units

Updated 120V induction incremental measure costs



Incremental Costs (induction vs. gas range)



Snapshot of original vs. updated TSB



	TSB (\$M)	Energy (\$M)	Grid (\$M)	GHG non-refrigerant (\$M)
Original	537	36	(125)	626
Updated	495	25	(131)	601

	TRC	PAC
Original	1.12	14.36
Updated	1.05	12.68

**Break (15 min.)
We will be back soon.**





5. 2026 Operations Plan & Budget

Lynette Curthoys, VP, Market Transformation

Jeff Mitchell, Principal, Market Transformation

Stacey Hobart, Principal, Stakeholder Engagement & Communications

Jim Giordano, Principal, Business Operations

2026 Operations Plan overview

- Plan represents the work and major milestones for the CalMTA program throughout the year
- Serves as the basis of reporting for quarterly activity updates and KPI score card
- Part of our obligation to MTAB is informing members on progress of MTI portfolio development and budgets

2026 key objectives

1. Launch California's first two MTIs
2. Further develop the MT portfolio with an Application to move three additional MTI Plans to implementation
3. Continue with program development research and analysis for the next tranche of ideas
4. Leverage the permanent RFI to continue to seek new opportunities to fill the pipeline

2026 key objectives

5. Apply an equity lens in our work so that MTIs can effectively deliver benefits to ESJ communities
6. Continuously optimize and improve business systems and practices as our organization matures and evolves
7. Strengthen and expand stakeholder relationships to broaden awareness of CalMTA's work and align with other programs

1st quarter 2026 milestones: MTI development



Final CRTUs MTI Plan for MTAB and public comment	●
Submit revised Induction Cooking MTI Plan via Tier 2 Advice Letter to the CPUC	◐
Finalize statewide engagement contracts with national retailers for induction cooking stocking incentive	●
Finalize statewide engagement contracts with national retailers for RHP stocking incentive	●

2nd quarter 2026 milestones: MTI development



Final CRAWs MTI Plan for MTAB and public comment

○

Final Residential HPWH MTI Plan for MTAB and public comment

○



3rd quarter 2026 milestones: MTI development



Release Foodservice Water Heating Systems market characterization report	○
Complete Foodservice Water Heating Systems product assessment report	○
Launch RHP Phase III: Market Deployment with implementation plan	○



4th quarter 2026 milestones: MTI development



Release CRAWs field study report	○
Release CBEA market characterization report	○
Complete CBEA product assessment report	○
Launch Induction Cooking Phase III: Market Deployment with implementation plan	○
New idea #8 Advancement Plan	○

1st quarter 2026 milestones: Stakeholder engagement and communications



		
To be started	In process	Completed

Publish 2026 Operations Plan and Budget	
<i>Idea to Initiative</i> education series for upcoming MTIs	
Hold 2025 Q4 quarterly report webinar & publish KPI scorecard	
Host Q1 Equity Sounding Board meeting	

2nd quarter 2026 milestones: Stakeholder engagement and communications



Hold Q1 2026 quarterly report webinar & publish KPI scorecard

○

Host Q2 Equity Sounding Board meeting

○

Publish 2025 Annual Report

○



3rd quarter 2026 milestones: Stakeholder engagement and communications



Hold Q2 2026 quarterly report webinar & publish KPI scorecard

○

Kick off external program alignment meetings for RHP implementation

○



4th quarter 2026 milestones: Stakeholder engagement and communications



Host Q4 Equity Sounding Board meeting	○
Recruit and seat Equity Sounding Board members to fill four vacancies	○
Kick off external program alignment meetings for Induction Cooking	○
Kick off <i>Idea to Initiative</i> education series for CBEA and Foodservice	○
Hold Q3 2026 quarterly report webinar & publish KPI scorecard	○

1st quarter 2026 milestones: Administration and operations



		
To be started	In process	Completed

Hold Q1 MTAB meetings	
Recruit for MTAB members whose two-year terms expire in April 2026	
Seat a new member to the Evaluation Advisory Group due to a vacancy	

2nd quarter 2026 milestones: Administration and operations



Application with next tranche of MTIs submitted	○
Hold Q2 MTAB meeting	○
Seat new MTAB members for those whose two-year terms expired	○
Final Organizational Review completed and delivered to CPUC/MTAB	○
Issue evaluation RFP for RHP initiative	○

3rd quarter 2026 milestones: Administration and operations



Contract with third-party implementer for RHP initiative	○
Contract with third-party evaluator for RHP initiative	○
Hold Q3 MTAB meeting	○
Issue implementation RFP for Induction Cooking initiative	○

4th quarter 2026 milestones: Administration and operations



Hold Q4 MTAB meeting	○
MTI scorecard launch	○
Issue evaluation RFP for Induction Cooking initiative	○
Contract with third-party implementer for Induction Cooking	○
Contract with third-party evaluator for Induction Cooking Initiative	○



2026 Program Budget

CalMTA is a program of the California Public Utilities Commission and is administered by Resource Innovations.

Authorized six-year budget



Table 3. Approved Budget for CalMTA for First Tranche of MTIs

Cost Category	Total Approved Budget by Year (\$000)						Totals
	2026	2027	2028	2029	2030	2031	
MTA Administration	1,271	1,257	1,414	403	424	424	5,193
MTA Operations	4,237	4,361	4,434	1,382	1,427	1,427	17,268
Initiative/Concept Development							
Phase I Activities	634	618	633	653	673	673	3,884
Phase II Activities	2,917	0	0	0	0	0	2,917
Future MTI Development	2,234	1,126	776	628	574	574	5,912
MTI Market Deployment (Phase III)							
Induction Cooking	4,952	6,183	6,445	5,263	4,778	4,778	32,399
Room Heat Pumps	5,437	7,347	7,556	7,692	6,954	6,954	41,940
Other Administrative Costs							
Evaluation	512	527	543	560	577	577	3,296
PG&E Costs	300	300	300	300	300	300	1,800
Totals	22,494	21,719	22,101	16,881	15,707	15,707	114,609

Decisions affecting the 2026 Operations Plan budget



- Induction Cooking MTI approved conditionally:
 - Required a Tier 2 Advice letter by April 3
 - Narrowed scope to focus on 120-volt cooking products
 - Required updates to strategic interventions to take into account changes in policy landscape
 - Required that we revise the deployment budget to not exceed the amount in the authorization.

Decisions affecting the 2026 Operations Plan budget



- CalMTA must file a second application to request approval of additional MTIs and their funding
- The original application budget assumed future MTIs would be approved by Tier 2 Advice Letters
 - Significantly lengthens the time to advance MTIs from Phase II (Development) to Phase III (Deployment)
 - ~Three months for approval via advice letter
 - ~10-12 months for approval via application
 - Additional time to batch together a tranche.

Impacts on the 2026 budget

- Costs associated with non-routine administration will increase due to more time required to support a second application proceeding.
- Requirement to revise the MTI Plan for Induction Cooking will:
 - Increase Phase II spending
 - Delay its move into Phase III Deployment
 - Shift some of the Phase III Deployment costs and all third-party Evaluation costs into 2027.

Impacts on the 2026 budget



- Other MTIs will remain in Phase II longer, increasing Phase II spending on these MTIs in 2026
 - Will require CalMTA to pull forward Phase II funding from outer years to fund this additional Phase II work in 2026, and
 - Push Phase III budget into future years.

Impacts on the 2026 budget

- CalMTA is reforecasting our cost estimate for the entire six-year funding period to assess the impact of these changes on future years.
- Anticipate filing a Tier 2 Advice Letter in the future to shift funds from other cost categories to cover the expansion of Phase II expenditures triggered by directives in D.25-11-023.

Comparison of Operations Plan and Decision budgets



Cost Category	2026 Budget in the Decision	2026 Ops Plan Budget	Increase (Decrease) \$	% Increase (Decrease) vs Decision Budget
Administration	\$ 1,271,000	\$ 1,318,000	\$ 47,000	4%
Operations	\$ 4,237,000	\$ 4,260,000	\$ 23,000	0.5%
MTI Development	\$ 5,785,000	\$ 7,315,000	\$ 1,530,000	26%
Phase I Activities	\$ 634,000	\$ 634,000	\$ -	0%
Phase II Activities	\$ 2,917,000	\$ 6,681,000	\$ 3,764,000	129%
Funds Reserved	\$ 2,234,000	\$ -	\$ (2,234,000)	-100%
MTI Deployment	\$ 10,389,000	\$ 7,676,000	\$ (2,713,000)	-26%
Induction	\$ 4,952,000	\$ 2,359,000	\$ (2,593,000)	-52%
RHP	\$ 5,437,000	\$ 5,317,000	\$ (120,000)	-2%
Evaluation	\$ 512,000	\$ 92,000	\$ (420,000)	-82%
Induction	\$ 237,000	\$ -	\$ (237,000)	-100%
RHP	\$ 275,000	\$ 92,000	\$ (183,000)	-67%
Totals	\$ 22,194,000	\$ 20,661,000	\$ (1,533,000)	-7%

2026 Operations Plan budget detail

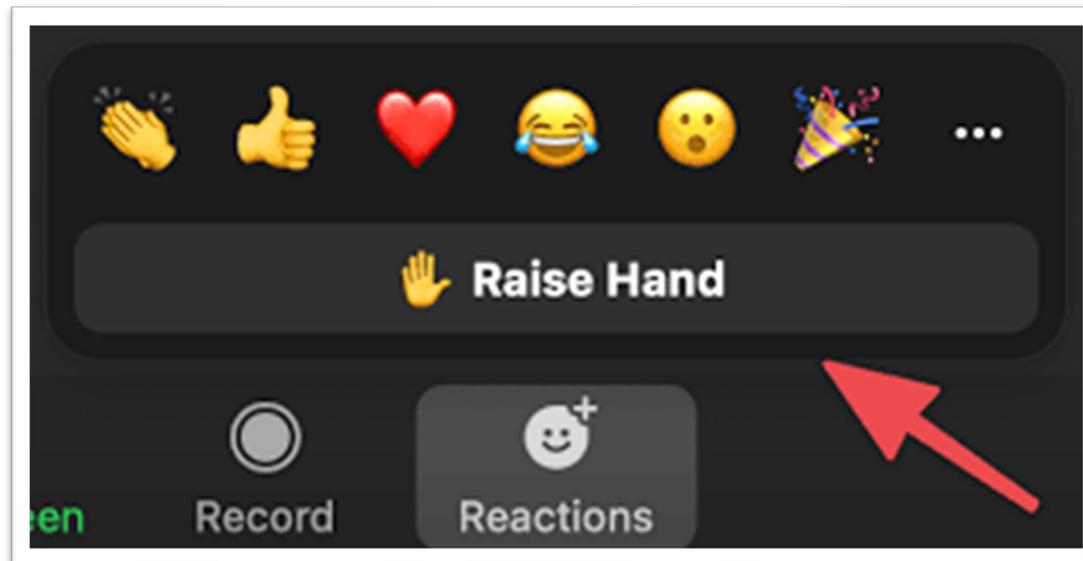


Cost Category	Major Activity	2026					Cost Category Totals
		Labor ¹	Non-Labor ²	3rd Party ³	Incentives	Totals	
MTA Administration	Administration Subtotals	\$ 943,000	\$ 375,000	\$ -	\$ -	\$ 1,318,000	\$ 1,318,000
	Routine Financial and Administrative Tasks	\$ 807,000	\$ 2,000	\$ -	\$ -	\$ 809,000	
	Non-Routine Financial and Administrative Tasks	\$ 136,000	\$ 373,000	\$ -	\$ -	\$ 509,000	
MTA Operations	Operations Subtotals	\$ 3,827,000	\$ 433,000	\$ -	\$ -	\$ 4,260,000	\$ 4,260,000
	Project Management and Operations	\$ 1,132,000	\$ 91,000	\$ -	\$ -	\$ 1,223,000	
	MTAB Administration	\$ 277,000	\$ 90,000	\$ -	\$ -	\$ 367,000	
	Policy	\$ 513,000	\$ -	\$ -	\$ -	\$ 513,000	
	Stakeholder Engagement and Communications	\$ 1,632,000	\$ 206,000	\$ -	\$ -	\$ 1,838,000	
	Data Systems Development and Management	\$ 273,000	\$ 46,000	\$ -	\$ -	\$ 319,000	
MTI Development	Concept Development (Phase I Activities)	\$ 634,000	\$ -	\$ -	\$ -	\$ 634,000	\$ 7,315,000
	Program Development (Phase II Activities)	\$ 6,619,000	\$ 45,000	\$ -	\$ 17,000	\$ 6,681,000	
	Efficient Rooftop Units	\$ 715,000	\$ 8,000	\$ -	\$ -	\$ 723,000	
	Commercial Replacement & Attachment Windows	\$ 1,280,000	\$ 18,000	\$ -	\$ -	\$ 1,299,000	
	Food Service Water Heating Systems	\$ 1,143,000	\$ 19,000	\$ -	\$ -	\$ 1,162,000	
	Residential Heat Pump Water Heaters	\$ 1,045,000	\$ -	\$ -	\$ -	\$ 1,045,000	
	Induction Cooking	\$ 615,000	\$ -	\$ -	\$ 17,000	\$ 632,000	
	Commercial Building Efficiency Accelerator	\$ 1,820,000	\$ -	\$ -	\$ -	\$ 1,820,000	
Funds Reserved for Future MTI Program Development	\$ -	\$ -	\$ -	\$ -	\$ -		
MTI Deployment	Induction Cooking	\$ 913,000	\$ 58,000	\$ 1,180,000	\$ 208,000	\$ 2,359,000	\$ 7,676,000
	Upstream Incentives	\$ -	\$ -	\$ -	\$ 208,000	\$ 208,000	
	Consumer Incentives	\$ -	\$ -	\$ -	\$ -	\$ -	
	Room Heat Pump	\$ 1,612,000	\$ 575,000	\$ 2,130,000	\$ 1,000,000	\$ 5,317,000	
	Upstream Incentives	\$ -	\$ -	\$ -	\$ 1,000,000	\$ 1,000,000	
	Consumer Incentives	\$ -	\$ -	\$ -	\$ -	\$ -	
Evaluation	Induction Cooking	\$ -	\$ -	\$ -	\$ -	\$ -	\$ 92,000
	Room Heat Pump	\$ -	\$ -	\$ 92,000	\$ -	\$ 92,000	
PG&E Costs ⁵	Funds reserved to cover PG&E's costs						\$ 300,000
Totals		\$ 14,548,000	\$ 1,486,000	\$ 3,402,000	\$ 1,225,000	\$ 20,661,000	\$ 20,961,000

Questions & Discussion

6. Public Comment

Raise your hand using the “Reactions” feature and we will allow you to unmute yourself.



7. Next Meeting and Next Steps

Stacey Hobart, Principal of
Engagement & Communications



Upcoming MTAB meetings



	Wednesday, March 25, 2026	TBD April/May 2026
Time	9 AM - 1 PM	9 AM - 4 PM
Location	Virtual - Zoom	In-person, location TBD
Topics	RHPWH MTI TSB & Evaluation Plan	CRAWS MTI TSB & Evaluation Plan

MTAB recruiting

Extended MTAB recruitment through today (3/5); will be reviewing and scoring submissions in the coming weeks for new terms to start in April.

Transformative Energy Solutions for the public good

Market transformation is a proven approach that works to remove market barriers so that energy efficient, equitable, and climate-friendly approaches become the new standard practice for all Californians.

Sign up for updates at: calmta.org/subscribe/

Questions? Email info@calmta.org

Follow us on
LinkedIn:

