U.S. Department of Transportation

Federal Highway Administration

Toolkit for Public-Private Partnerships for Electric Vehicle Charging Infrastructure: EVCI-FAST User Guide

June 2024

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16. Abstract

This document is Part 3 of an Electric Vehicle Charging Infrastructure (EVCI) P3 Toolkit developed to provide technical assistance to public sector practitioners navigating the nascent EVCI market. The P3 Toolkit is comprised of three educational tools:

1. The EVCI-SCREEN Tool is designed to assist states and communities in determining whether they are ready to start an EVCI procurement and, if so, whether a performance-based P3 contract would be appropriate.
2. The EVCI Strategic and Tactical Advance Tool (EVCI-STAT) provides a step-by-step process for considering the EVCI strategic goals and the tactical considerations to move EVCI projects from consideration to implementation using a P3.
3. The EVCI Financial Analysis Spreadsheet Tool (EVCI-FAST) aids in assessing the financial viability of an EVCI project, including the potential range of public subsidy that may be required, as well as potential payments from the private partner to the public agency in cases where the EVCI project may be capable of generating surplus revenue.

This document is a User Guide for the third tool.

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Glossary

CFI	Charging and Fueling Infrastructure Discretionary Grant Program
DAC	Disadvantaged Community
DBFOM	Design-Build-Finance-Operate-Maintain
DCF	Discounted Cash Flow
DOT	Department of Transportation
EV	Electric Vehicle
EVCI	Electric Vehicle Charging Infrastructure
EVSE	Electric Vehicle Supply Equipment
FAST	Financial Analysis Spreadsheet Tool for Electric Vehicle Charging Infrastructure
FAR	Federal Acquisition Regulation
FHWA	Federal Highway Administration
GB	Grant-Based
IRR	Internal Rate of Return
kWh	kilowatt-hours
NEPA	National Environmental Policy Act
NEVI	National Electric Vehicle Infrastructure
NPV	Net Present Value
NTP	Notice to Proceed
O&M	Operations & Maintenance
PB	Performance-Based
P3	Public-Private Partnership
RFI	Request for Information
RFP	Request for Proposal
RFQ	Request for Qualification
STAT	Strategic Goals and the Tactical Advance Tool for Electric Vehicle Charging Infrastructure
WACC	Weighted Average Cost of Capital

For More Information

The EVCI P3 Toolkit includes tools to assist in educating public sector policymakers, legislative and executive staff, and transportation professionals in considering and developing performance based EVCI P3 projects. The EVCI P3 Toolkit and additional educational information on P3s and on delivering EVCI projects using P3s are available at the website of FHWA's Center for Innovative Finance Support.

FHWA P3 Toolkit www.fhwa.dot.gov/ipd/p3/toolkit

For more information regarding FHWA assistance and resources, please contact Patrick DeCorla-Souza, FHWA's P3 Program Manager at Patrick.DeCorla-Souza@dot.gov or (202) 366-4076.

1 Introduction

The current growth and expected surge in EV adoption necessitates the development of an extensive Electric Vehicle Charging Infrastructure (EVCI) network. Federal grant programs such as the National Electric Vehicle Infrastructure (NEVI) and the Charging and Fueling Infrastructure Grant (CFI) Programs make billions of dollars in grants available to states and communities to encourage EVCI network development. The EVCI market is inherently a private-sector endeavor. Still, programs like NEVI and CFI are providing public funds to jumpstart private EVCI investment to meet the expected surge in demand. Providing grants to support private endeavors is often considered to be a Public-Private Partnership (P3) due to the financial collaboration between the public and private sectors. However, this type of "grant-based" P3 may not be effective in ensuring the operational performance of the EVCI and in achieving the goals of the public agency. A true "performance-based" P3 could help ensure the achievement of public sector goals.

Performance-based P3s are defined as long-term contractual agreements between a public agency and a private entity to design, build, finance, operate, and/or maintain (DBFOM) an infrastructure project. Many public agencies have been utilizing such P3 contracts over the past three decades to expand the role and responsibility of the private sector in delivering transportation infrastructure in all modes. Performance-based P3 contracts offer public agencies improved efficiency, development expertise, and access to private capital. Some project risks can be shared by private developers, offering lower risk to the public.

Performance-based P3s may offer similar benefits for the development of EVCI projects. However, EVCI projects are not traditional transportation infrastructure projects. They are much smaller investments exposed to rapid technological change and uncertain revenue generation and are often developed on privately owned land. Thus, they call for states and communities to explore innovative contracting approaches. Performance-based P3 contracts for EVCI, like traditional P3s, seek to engage the private sector through contractual arrangements, leveraging private financing and risk transfer to spur private charging station development.

Performance-based P3 contracts offer promising solutions, but their adaptation to the unique challenges of the EV market requires ongoing research, collaboration, and state and community-specific considerations. Key structuring parameters of performance-based P3 contracts may include consideration of risk allocation, revenue guarantees, supervening events, payment mechanisms, handback provisions, and procurement strategies. Some recent FHWA reports that may clarify the issues include the following recent FHWA reports:

- Structuring Options for Performance-based Contracts under the NEVI Program: A Discussion Paper
- State of the Practice and Emerging Practices on Public-Private Partnerships for Electric Vehicle Charging Infrastructure
- Market Engagement and Partner Selection for Electric Vehicle Charging Infrastructure Public-Private Partnerships

About half of the State DOTs have initiated EVCI procurement actions, as have many communities, but there are no documented best practices yet for states or communities to follow.

This document is Part 3 of an Electric Vehicle Charging Infrastructure (EVCI) P3 Toolkit developed to provide technical assistance to public sector practitioners navigating the nascent EVCI market and seeking to use a P3. The Toolkit is comprised of three tools:

1. The EVCI-SCREEN Tool is designed to assist states and communities in determining whether they are ready to start an EVCI procurement and, if so, whether a performance-based P3 contract would be appropriate.

2. The EVCI Strategic and Tactical Advance Tool (EVCI-STAT) provides a step-by-step process for considering the EVCI strategic goals and the tactical considerations to move EVCI P3 projects from consideration to implementation.

3. The EVCI Financial Analysis Spreadsheet Tool (EVCI-FAST) provides assistance in assessing the financial viability of an EVCI P3 project, including the potential range of public subsidy that may be required, as well as potential payments from the private partner to the public agency in cases where the EVCI project may be capable of generating surplus revenue. The tools may also be used to understand rates of return reflected in P3 bids and contingent public liabilities.

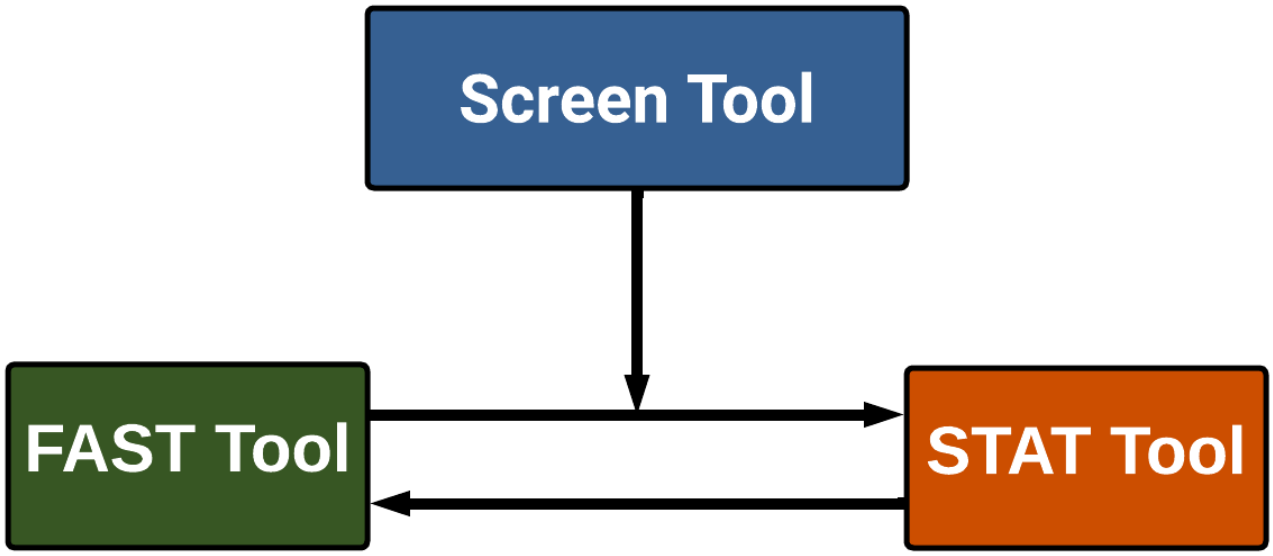

Figure 1: How Screen, FAST, and STAT tools work together.

Each tool can be used independently from the others, but they may be most useful when used together. Use the Screen tool to determine if an EVCI project is right for your community and if a performance-based P3 contract best suits your needs. The FAST tool can provide project financial analysis to support this assessment. If a P3 is selected, STAT can assist with taking steps to achieve your community's strategic goals related to EVCI projects. This toolkit focuses exclusively on the EVCI-FAST tool.

2 Financial Analysis Spreadsheet Tool for EVCI

The EVCI Financial Analysis Spreadsheet Tool (EVCI-FAST) helps in assessing the financial viability of an EVCI project, including the potential range of public subsidy that may be required, as well as potential payments from the private partner to the public agency in cases where the EVCI project may be capable of generating surplus revenue.

Download the EVCI-FAST Excel tool, open and make sure macros are enabled, and make sure the tabs are zoomed in 60-70% or more so you can comfortably view the tool. The EVCI-FAST tool was designed for and on Microsoft Excel 365 (Version 2403) – operability of EVCI-FAST with older versions of Excel is not guaranteed.

EVCI-FAST is organized into the following sheets: START-INTRO, Reference Material, Flow Chart, Inputs – Constant, Inputs – Time Series, Outputs, DCF (discounted cash flow), and Outcomes Dashboard.

TAB 1: The user should begin on the **START-INTRO** tab. This tab provides an overview of the model sheets, including navigation buttons (links), as shown below. In addition, contact information for obtaining assistance with the tool is provided. ***It should be noted that any values currently in the tool are provided only as examples and are not to be taken as defaults. Users are responsible for entering project-specific information. Results are dependent on data inputs, which are the sole responsibility of the user. To return to the sample values, simply re-download the tool.***

Sheets	
Sheet Name	**Description**
Reference Material	This sheet provides sources to information on costs and economic impacts associated with EVCI.
Flow Chart	This sheet outlines how the inputs flow into the outputs and discounted cash flow model, which then feed into summary charts.
Inputs - Constant	This sheet contains inputs for initial capital costs, revenues, demand, the discount rate, and escalation factors.
Inputs - Time Series	This sheet contains time series inputs for O&M costs, government support, revenues, and revenue structures.
Outputs	This sheet contains the outputs for total costs, government support, revenues, operating income, and revenue structures.
DCF	This sheet calculates the discounted cash flow, net present value, internal rate of return, optimal subsidy, and discounted payback period for the EV charging infrastructure project.
Outcomes Dashboard	This sheet contains statistics and charts summarizing key financial data relevant to the EVCI Project.

Figure 2: FAST's START-INTRO Tab Links.

TAB 2: The **Reference Material** tab provides a list of sources that may be helpful to users looking for input data for the tool. As noted above, users must input project-specific data to utilize the tool properly. Results are dependent on data inputs, which are the sole responsibility of the user.

TAB 3: The **Flow Chart** tab provides a detailed description of the model components. A simplified flow chart is presented in Figure 3.

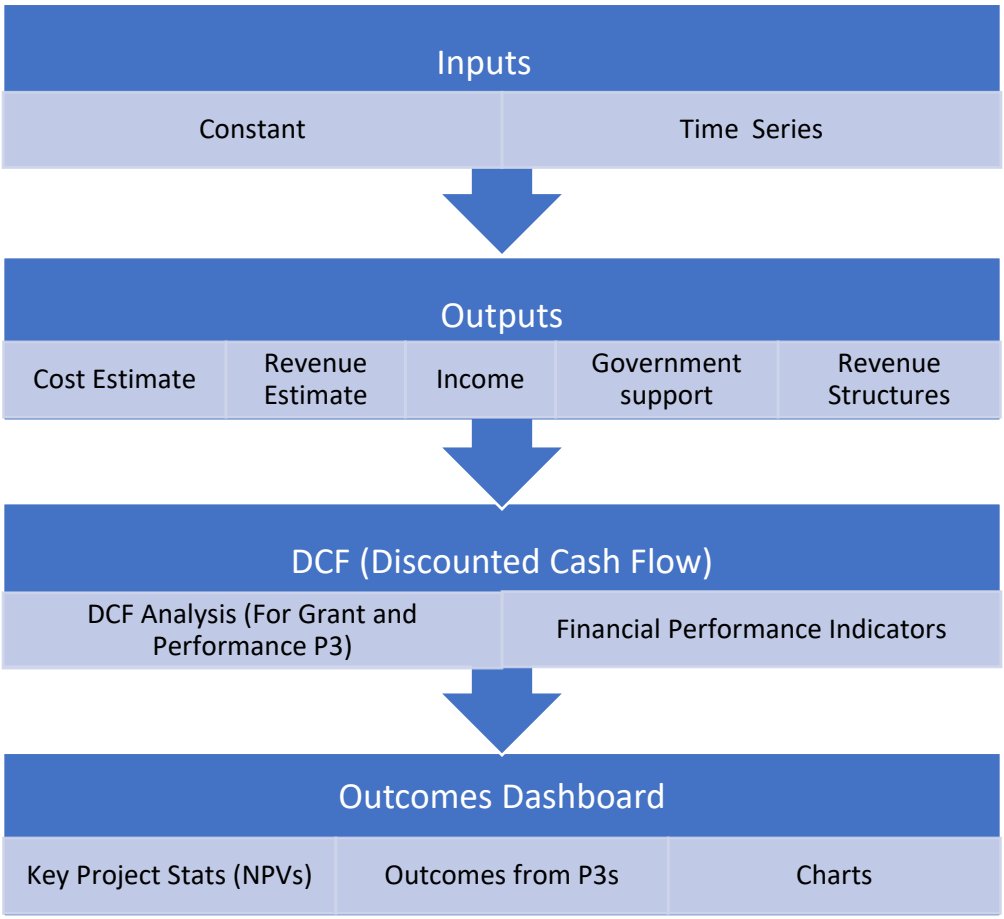

Figure 3: FAST's Flow Chart Tab provides a visual overview mapping of the tool including inputs, outputs, and charts.

TAB 4: The **Inputs-Constant** tab should be utilized for values that do not change over the analysis period but may be escalated by given escalation factors input into the model, such as demand and revenues. Sections are provided for estimates of initial capital costs, revenues, and demand. Key financing assumptions are the discount rates for alternative P3 structures. Inputs include escalation factors for the various time series inputs and the term length of the contract.

To begin, the project title and scenario number should be entered in cells B12 and B13, respectively. Selected values are provided as an example; however, these should not be considered default values.

For Capital Cost Estimates, users may enter detailed information into the cells provided, or a total estimate may be entered into the user override cell if a total is preferred. Since we are taking a public sector perspective, only Eligible costs are considered in this model. The Cost Allocation in the Capital Delivery Phase is simply asking what percentage of the initial capital cost is spent in Year 0, typically the planning phase, vs Year 1 and 2, the construction phase. For simplicity, it is possible to put a 100% in Year 0 and leave the other years blank – if this is done, ensure that the cost is input in terms of NPV in Year 0.

California DOT EVCI P3 Test: Run 1 (Baseline Multiple Revenue Scenario)

Initial Capital and Construction Cost Estimate Input (Nominal):

Capital Cost Item	Eligible Costs	User Override
1. Pre-Construction and Other Costs *	* $150,000	
2. Implementation Costs	*$1,150,000*	
2a. Utility *	* $50,000	
2b. Make-Ready Infrastructure Cost *	* $900,000	
2c. EVSE *	* $200,000	

Cost Allocation in Capital Delivery Phase	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2
Percentage of Initial Capital Cost Spent *	* 50%	* 25%	* 25%

Figure 4: Example of FAST's Capital Cost Estimates found on Tab 4.

The capital costs in Figure 4 are roughly based on a rest area EVCI facility in California – these costs vary greatly based on location and design choices.

For Revenue Estimates, users can select a baseline, pessimistic, or optimistic scenario to develop a range. The estimate of the share of charging during peak hours should be entered as a percentage. Below that are sections to input the Price per kWh paid by the user of the EV port during peak and non-peak hours. This, along with Peak-Hour Charging Share is used to calculate a weighted average price. If you do not have peak and off-peak hour information, simply set share of charging during peak hours to 100% and input the average Price per kWh in the Price per kWh – Peak Hours cell (which will change to "Average Price per kWh *" when peak hour charging is 100%).

Revenue Estimate Input:		
Revenue Scenario - Multiple		
Pessimistic (<1) *	Baseline	Optimistic (>1) *
* 0.8	*1*	* 1.3
-		
Revenue Scenario Selector *		
Optimistic (>1) *		
-		
Peak-Hour Charging	**Value**	**Column1**
Share of Charging During Peak Hours *(if you only have average price/kWh information, input 100%) **	* 100%	*If this value is 100%, t
-		
Price per kWh (Paid by Customer)	**Values**	
Average Price per kWh *	* $0.36	
Price per kWh - Off-Peak Hours *	* $0.00	

Figure 5: Example of FAST's Revenue Estimate inputs found on the Inputs – Constant Tab.

The Pessimistic/Optimistic multiples are meant to be assumptions with which users can test the model. The share of peak-hour charging and the pricing are simply rough assumptions to produce a reasonable weighted average price per kWh. Definitions of "Peak-Hour" can be decided by the user. Keep in mind that all input values are sample values based on rough assumptions and not defaults.

To estimate Demand, users may use a bottom-up or a top-down approach to arrive at a value for total annual visits in the first operational year. For a top-down approach (not covered in this tool), users should consider traffic volume, EVs as a % of traffic volume, anticipated EV growth rate, expected number of charging sessions per EV car trip, and other factors. Remember that this demand estimate is for your specific EVCI Project; input the values you think are appropriate or perform your own calculations and enter them in the "User Override" cell.

Demand Estimate (Current):		
Rough Demand Estimation: Bottom Up Approach	**Values**	
Estimated Charge Duration per EV (hrs) *	* 0.5	
Estimated Occupancy per Port *	* 18%	*Number of hours a port is occupied per day = 4.32
Number of EV Ports *	* 4	
Annual Demand Growth Rate Assumption *	* 5%	*Input at your own discretion.
Daily Maximum Capacity per Port (number of vehicles)	*48*	*maximum capacity (number of cars) = 24 hrs / avg charge duration per EV
Daily Visits per Port	*8.64*	*Maximum Capacity per port * Occupancy Per port
Total Daily Visits to EVCI	*34.56*	*Daily Visits Per Port * Number of EV Ports
Annual Visits	***12614***	*For a top down approach consider traffic volume, EV's as

Figure 6: Example of FAST's Demand Estimates found on the Inputs – Constant Tab.

For the sample values, the annual demand growth rate is set to be conservative at 5% and the number of EV ports is assumed to be 4. More information on the inputs can be found in the Reference Material tab.

The Key Financing Assumption in this model is the discount rate. The discount rate is the investor's expected rate of return used to discount future cash flows to their present values. This is different from the Internal Rate of Return (IRR), which is the rate that makes the Net Present Value (NPV) of cash flows from the investment equal to zero – if a project's NPV is 0 or above, or if the IRR exceeds the investor's expected rate of return, then the project is typically seen as one worth pursuing for the investor. When the project's NPV = 0, then the Discount Rate = IRR.

In the Key Financing Assumptions and P3 Scenario section located in the Inputs – Constant tab, you can set separate discount rates for a Performance Based P3, Grant Based P3, and Minimum Revenue Guarantee (MRG). After deciding the discount rates, you must use the P3 Scenario selector to have the model display the desired scenario.

Key Financing Assumptions and P3 Scenario:

-

Discount Rate	Values	
Performance Based P3	* 10.00%	**Market return approximation is 10%*
Grant Based P3	* 10.00%	
Minimum Revenue Guarantee (Optional)	* 10.00%	

**Note that the tool does not take into consideration debt financing or taxes. It is meant to be an operational tool.*

-

P3 Scenario Selector*	Value
Grant Based P3	*10.00%*

Figure 7: Example of FAST's Key Financing Assumptions found on the Inputs – Constant Tab.

Below are inputs for escalation factors used in the time series tab. It should be noted that Energy Costs, which are part of the O&M Costs of the EVCI, tend to fluctuate. Energy costs also increase alongside demand, as the energy used by the station is assumed to increase if more vehicles visit, so it would be prudent to input the Annual EV Growth Rate Assumption you chose for the Demand inputs and combine it with the Energy Cost Growth Rate for this input. More information on energy costs can be found in the references. A rate of 2.5% can be used as an escalation factor to reflect the targeted US inflation rate of 2-3%.

Escalation:

Escalation Factors (Annual Growth Rates)	Values	
Operations Cost (Breakdown)		
Lease *	* 2.5%	
Energy Used by Station *	* 7.6%	**In this Example we are*
Equipment and Other Site Maintenance *	* 2.5%	
Fixed Charging Fee and Subscription Fee *	* 2.5%	
Price per kWh *	* 2.5%	
Other Revenues (advertising, other private sector partners on site, etc.) *	* 2.5%	

**2.5% can be used as an escalation factor to reflect targetted US inflation between 2-3%.*

Figure 8: Example of FAST's Escalation Factors found on the Inputs – Constant Tab.

The Term Length of the contract is set at the end of the Inputs – Constant tab using a selector. The Term Length is the number of Operational Years (inclusive of the year selected) for which the P3 contract is in effect and will guide the period for the model's analysis. In the model, construction is assumed to be done in Year 1 and 2, so the Model Year will always be 2 years greater than the Term Length. For example, a Term length of 7 years equates to Model Year 9. The term length has a minimum of 5 years in the model and a maximum of 10 years.

Term Length:

Term Length Selector *	Model Year
10	*Year 12*

**Number of operational years (inclusive of year)*

Year Type	Planning Year 0	Construction Year 1	Construction Year 2	Operations Year 1	Operations Year 2	Operations Year 3	Operations Year 4	Operations Year 5
Operational Years (Term Length)	-	-	-	*1*	*2*	*3*	*4*	*5*
Model Years	*Year 0*	*Year 1*	*Year 2*	*Year 3*	*Year 4*	*Year 5*	*Year 6*	*Year 7*
Model Inclusive of Year (Yes/No)	-	-	-	*Yes*	*Yes*	*Yes*	*Yes*	*Yes*

Figure 9: Example of FAST's Term Length Selector found on the Inputs – Constant Tab.

The table below the selector in Figure 9 simply translates the Term Length to Model Years – the last row of the Table selects "Yes" if the Model includes the year. This is an important row used in many of the output calculations and is a useful row for users' reference.

TAB 5: Users should utilize the Inputs-Time Series tab for values that change over the analysis period. These include operation and maintenance costs (O&M), additional capital requirements such as equipment replacement, and annual revenues. It is assumed that planning and construction are conducted in Years 0 to 2, with operations beginning in Year 3 and continuing for up to ten years. Users must change the term length using the Term Length Selector if operations are not projected to continue for ten years or the term of the P3 agreement is less than 10 years. As stated previously, example values are included in the tool but should not be considered default values. All values should be entered in nominal dollars (i.e., year-of-expenditure dollars). As per the legend, the italic cells are calculations, and in this case incorporate the escalation factors (from the Inputs – Constant tab). The cells with a star are user inputs, and the multiple dotted cells are user inputs that override any values calculated in the white cells with italicized font above.

Cost Estimate Input (Nominal) - Operations & Maintenance Phase:

Eligible O&M Costs	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
1. Operations Cost (Breakdown)	-	-	-	*$100,000*	*$105,063*	*$110,447*	*$116,176*	*$122,275*
1a. Lease *	-	-	-	* $30,000	*$30,750*	*$31,519*	*$32,307*	*$33,114*
1b. Energy Used by Station *	-	-	-	* $50,000	*$53,813*	*$57,916*	*$62,332*	*$67,085*
1c. Equipment and Other Site Maintenance *	-	-	-	* $20,000	*$20,500*	*$21,013*	*$21,538*	*$22,076*
-	-	-	-	-	-	-	-	-
2. Operations Cost (Own Values) *	-	-	-					

**Operation Costs (Breakdown) is a sum of the 3 cells below it. If you have your own total Operation Costs calculations for a year, please enter them in "Operation Costs (Own Values)", and leave rows 14-16*

Ongoing Capital Cost During Operational Period	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Ongoing Capital/Rehabilitation Costs *	-	-	-	* $0	* $0	* $0	* $0	* $50,000

Figure 10: Example of FAST's Cost Estimate Inputs found on the Inputs – Time Series Tab.

Below is a section with inputs for either a Performance Based P3 with availability payments, or a grant based P3. The inputs for the Performance Based P3 are simply the maximum allowable federal reimbursement amount in terms a percentage, which is currently set to 80% throughout the first five years of operations.

In a Grant Based P3, the grant is spread over the entire term of the agreement and is equal to up to 80% of annual costs net of revenues. In a Performance Based P3, this 80% is the threshold for the availability payment ratio, below which the full availability payment is reimbursed. This user input is unique in that if you select a Performance Based P3, Year 0 – 2 will be blocked out and if you select an MRG, then you will not use this table so the whole table is blocked out. In Figure 11 the table is set for Federal support to a Grant Based P3.

Government Support Inputs:

P3 Inputs (Grants and Performance Based P3)	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Federal Coverage % *	* 80%	80%	80%	80%	80%	80%	80%	80%

Figure 11: Example of FAST's Government Support Inputs found on the Inputs – Time Series Tab.

The table below outlines the revenue estimate input in a time series format. The Estimated Demand (number of annual visits) row has the Annual EV Growth Rate Assumption applied to it. If the user wants to input their own estimated demand values, they can input them into the Estimated Demand – User Override row, which will make the outputs use those values instead. The Revenues from Fees and Subscriptions as well as Other Revenues have escalation factors applied. The user can override the automatic revenue calculation (determined by previous inputs), by inputting their own values in the Revenue Estimate – Own Values (Override) Row at the bottom.

Revenue Estimate Input (Nominal):

Total Revenue Calculation for EVCI	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
1. Market Estimate Demand	-	-	-	-	-	-	-	-
1a. Estimated Demand (Number of Visits)	-	-	-	12,614	13,245	13,907	14,603	15,333
1b. Estimated Demand - User Override *	-	-	-					
1c. Average Energy Sold per Charging Session (kWh) *	-	-	-	* 25	* 25	* 25	* 25	* 25
2. Fees and Subscription Revenues (if applicable) •	-	-	-	• $0	$0	$0	$0	$0
3. Other Revenues (advertising, other private sector partners on site, etc.) •	-	-	-	• $0	$0	$0	$0	$0
4. Total Calculated Revenues (varies based on revenue scenario)	-	-	-	$122,259	$131,581	$141,614	$152,412	$164,034
5. Revenue Estimate - Own Values (Override) *	-	-	-					

Figure 12: Example of FAST's Revenue Estimate Inputs found on the Inputs – Time Series Tab.

Two optional revenue structures are provided if applicable to the project. These include a Minimum Revenue Guarantee and a Revenue Sharing Strategy. If you choose not to include such revenue structures in the model, these optional cells should be left blank.

Minimum Revenue Guarantee (MRG): If a minimum revenue guarantee is in place, then the percentage you input will be a percentage of the base forecasted revenues for the project. For example, if the MRG is 80%, this means that if the project falls short of the base forecasted revenues, the agency will guarantee up to 80% of this base forecasted revenue (until it is reached), but not more. A government contribution will be output when forecasted revenues are below the MRG %, as in a pessimistic revenue scenario. The purpose of the MRG is to help the developer get up to 80% of the base forecast revenues if they fall below 80%.

Revenue Sharing Strategy: If a revenue sharing strategy is implemented, the percentage of "surplus" revenue kept by the private developer is input. The threshold for the revenue-sharing mechanism is also input as a

percentage of the base forecasted revenues. In our example, any revenues above the threshold (any revenues above 120% of the base forecast revenues) are split 50-50 between the private developer and agency. It should be noted that this is an Upside Revenue Sharing Strategy, so revenues are only shared in the optimistic revenue scenario, where they exceed the base forecast past a set threshold.

In this section, there is also a table for the user to input Additional Returns to the Agency at their discretion, for example a lease payment if the infrastructure is constructed on land owned by the Agency.

Revenue Structures (Optional):

Minimum Revenue Guarantee	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Minimum Revenue Guarantee Private Sector is Eligible to Receive from Agency: % of (Base) Forecasted Revenues •	-	-	-	• 50%	50%	50%	50%	50%

Revenue Sharing Strategy	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Threshold for Revenues Triggering the Upside Revenue Sharing Mechanism: % of (Base) Forecasted Revenues •	-	-	-	• 120%	120%	120%	120%	120%
Proportion of Revenue above the Revenue Cap the Private Developer Will Collect •	-	-	-	• 50%	50%	50%	50%	50%

Additional Returns to the Agency	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Annual Returns (to be added to upside revenue sharing) •	-	-	-	• $0	• $0	• $0	• $0	• $0

**This could be lease payments, in which case the payments should be entered as costs in the Operations and Maintenance Costs in this tab as well.*

Figure 13: Example of FAST's Optional Revenue Structure Inputs found on the Inputs – Time Series Tab.

TAB 6: The **Outputs** tab contains results for total costs, revenues, government support, operating income, and revenue structures. Navigation buttons are provided to take users to the results sections as indicated below.

In the Cost Estimate Output section, a summary of (eligible) total costs for the development is provided, including the O&M phase and any additional capital required (equipment replacement, for example) for the EVCI project.

Cost Estimate Output (Nominal):

Total Annual Cost Breakdown	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Initial Capital Costs	$650,000	$325,000	$325,000	-	-	-	-	-
O&M Costs + Returns to the Agency in the Operations Phase (if applicable)	-	-	-	$100,000	$105,063	$110,447	$116,176	$122,275
Ongoing Capital/Rehabilitation Costs (Rehabilitation Costs)	-	-	-	$0	$0	$0	$0	$50,000
Total Project Costs	**$650,000**	**$325,000**	**$325,000**	**$100,000**	**$105,063**	**$110,447**	**$116,176**	**$172,275**

NPV of Total Costs	Values
Total Capital Cost (NPV)	$1,214,050
Total O&M Cost + Returns to the Agency (NPV)	$620,231
Total Ongoing Capital/Rehabilitation Costs (NPV)	$25,658
Total EVCI Project Costs (NPV)	**$1,859,938**

Figure 14: Example of FAST's Cost Estimate Outputs found on the Outputs Tab.

The table below outlines the outputs for Government Support. For a Performance-based P3, the Availability Payments are calculated by calculating the NPV of Total Revenues minus the NPV of Total Eligible Costs, spread over the operational years with the future value factor (1/discount factor – this value is calculated in the DCF tab) applied to convert it into year of expenditure dollars.

From there, the Availability Payment Ratio (AP Ratio) is calculated. The AP Ratio = NPV of the Availability Payments / NPV of Total Eligible Costs. If the AP Ratio is smaller than the allowable Federal Coverage % (which is a user input in the Inputs – Time Series Tab), then the full availability payment (less any deductions made for performance issues) will be reimbursed by the Federal Government. If it is greater than the allowable Federal Coverage %, then the share of the availability payment (less any deductions) covered by Federal reimbursement will be the allowable Federal Coverage Percentage divided by the availability payment ratio, and the State Agency or P3 Developer will have to cover the remaining portion (Non-Federally Reimbursed Amount). This is automatically calculated based on inputs.

In a grant based P3 the outputs are simply the grant amounts in the first three years of planning and construction and the grant amounts during the O&M phase, as well as the NPV of the Grants. The grants should amount to 80% of net eligible costs (i.e., total eligible costs minus revenues) each year – if the project yields positive cash flow in a year, the grant amount will be zero.

Government Support:

Performance Based P3

Calculation of Total Availability Payment	Values
NPV of Revenues - Cost	-$1,025,685
NPV of Total Availability Payment	$1,025,685

Availability Payments and Federal Reimbursement Calculation - Time Series	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Future Value or Compound Factor (1/Discount Factor)	-	-	-	1.33	1.46	1.61	1.77	1.95
Availability Payments	-	-	-	$102,568	$102,568	$102,568	$102,568	$102,568
Availability Payment Adjusted for Discount Rate (Future Values)	-	-	-	**$136,519**	**$150,171**	**$165,188**	**$181,706**	**$199,877**
Availability Payment Ratio: *NPV of Total Availability Payment / (NPV of Total Eligible Costs)*	-	-	-	55%	55%	55%	55%	55%
Federal Coverage %	-	-	-	80%	80%	80%	80%	80%
Federal Reimbursement of Availability Payment %	-	-	-	100%	100%	100%	100%	100%
Federal Reimbursement	-	-	-	**$136,519**	**$150,171**	**$165,188**	**$181,706**	**$199,877**
Non-Federally Reimbursed Portion of Availability Payment %	-	-	-	0%	0%	0%	0%	0%
Non-Federally Reimbursed Amount	-	-	-	**$0**	**$0**	**$0**	**$0**	**$0**

Figure 15: Example of FAST's Government Support Outputs for Performance Based P3s found on the Outputs Tab.

Grant Based P3

Grant Payments - Time Series	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Grants (Milestone/Progress Payments)	**$520,000**	**$260,000**	**$260,000**	**$0**	**$0**	**$0**	**$0**	**$6,593**

Calculation of Total Grant	Value
NPV of Grants	**$974,623**

Figure 16: Example of FAST's Government Support Outputs for Grant Based P3s found on the Outputs Tab.

The Revenue Estimate outputs show revenues from charging activity, fees and subscriptions, and any other revenues, if applicable. The revenue scenario multiple (to calculate pessimistic and optimistic revenue scenarios) is applied to the Total Revenues from EV Charging, Fees, and Subscriptions. Operating Income in this model is simply Revenues minus costs during the Operational Phase of the Project.

Revenue Estimate Output (Nominal):

Revenue Scenario and Multiple	Selection
Revenue Scenario	Baseline
Multiple	1

*only applied to EV charging related revenues

Revenue Estimates	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Price per kWh (Peak and Off-Peak Weighted Average)	$0.36	$0.37	$0.38	$0.39	$0.40	$0.41	$0.42	$0.43
Total Revenues from EV Charging, Fees, and Subscriptions	-	-	-	**$122,259**	**$131,581**	**$141,614**	**$152,412**	**$164,034**
Other Revenues (Advertising, Private Sector Partners On-Site, if applicable)	-	-	-	$0	$0	$0	$0	$0
Total Project Revenues	-	-	-	**$122,259**	**$131,581**	**$141,614**	**$152,412**	**$164,034**

Operating Income of EVCI

Annual Operating Income	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Operating Income	-	-	-	$22,259	$26,519	$31,167	$36,236	-$8,241

Calculation of Total Operating Income	Value
NPV of Operating Income	**$188,365**

Figure 17: Example of FAST's Revenue Estimate Outputs and Operating Income found on the Outputs Tab.

Results of revenue structures (if any) are provided annually over the scenario timeframe.

Optional Revenue Structures (Nominal):

Minimum Revenue Guarantee	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Base Forecast Revenues	-	-	-	$122,259	$131,581	$141,614	$152,412	$164,034
Current Forecast Revenues	-	-	-	$122,259	$131,581	$141,614	$152,412	$164,034
Maximum Potential Revenue Guarantee	-	-	-	$61,129	$65,791	$70,807	$76,206	$82,017
Agency Contribution	-	-	-	$0	$0	$0	$0	$0

*Based on inputs and minimum revenue guarantee agreements. This is up to how much the agency could pay out to the private developer if actual revenues are below base forecast.

Revenue Sharing Strategy	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Revenue Cap	-	-	-	$146,711	$157,897	$169,937	$182,895	$196,841
Revenues Above the Cap	-	-	-	NA	NA	NA	NA	NA
Amount of Revenue above the Revenue Cap Private Developer Will Collect (if applicable)	-	-	-	$0	$0	$0	$0	$0
Amount of Revenue Above the Revenue Cap that the Public Agency Will Receive Back (if applicable)	-	-	-	$0	$0	$0	$0	$0

Total Returns to Agency	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Total Returns to the Agency (Upside Revenue Share + Additional Returns)	-	-	-	$0	$0	$0	$0	$0

Figure 18: Example of FAST's Revenue Structures Outputs found on the Outputs Tab.

TAB 7: Results of the **Discounted Cash Flow Analysis** include discounted cash flow, net present value, internal rate of return, and a cell for discounted payback period for the EV charging infrastructure project. A Discounted Cash Flow (DCF) table is present for a Performance Based P3, Grant Based P3, and Minimum Revenue Guarantee structure.

Discount Factor = 1/(1+r) ^n (where "r" is the discount rate and "n" is the period)

The discount factor is multiplied by the Free Cash Flows to calculate Discounted Cash Flows (present values (PV) of future cash flows), which are summed to get the NPV. Typically, if NPV = 0 or > 0, then it is a project worth pursuing.

The IRR is the rate of return an investment is expected to generate.

The Discounted Payback Period = Amount of time to recoup investment = Years Until Break-Even + (Unrecovered PV at the Start of the Recovery Year/PV of Cash Flow in the Recovery Year). If none of the Cumulative Discounted Cash Flows are ≥ 0, then the payback period is not within the scope of this projection.

Notably, the IRR calculation in the DCF tab may return a blank value in certain instances. This typically occurs when the Free Cash Flows over the term length do not contain at least one negative and positive value, or if the IRR () formula in Excel is unable to find an IRR that corresponds to an NPV of zero after a certain number of iterations. In this instance, project revenues may be too low and/or costs too high, the term length may be too short to yield a positive cash flow, or there may be a general inconsistency in the cash flows not allowing the formula to converge. One way you could try to yield an IRR before changing the model's assumption is by providing the formula with a guess. Go to "Review" in the Excel Ribbon and click "Unprotect Sheet", then select the cell with the IRR formula and enter a guess after the selected range. For example, =IFERROR(IRR(Range), "") this is the equation currently as is, and this would be the equation with a -50% IRR guess: =IFERROR(IRR(Range, -0.5) ""). Once you have a result, delete the guess portion of the IRR formula to return to default.

In the performance based P3 approach, due to the presence of availability payments, the NPV will be zero and IRR = Discount Rate. It should be noted that the discount factor in Year 0 is 1, as that is assumed to be Period 0 or the planning phase (present) – this applies to the other DCF tables as well.

Discounted Cashflow Analysis: Performance Based Approach

DCF Table - Performance Based P3	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Total **Eligible** Capital Expenditures	$650,000	$325,000	$325,000	-	-	-	-	-
Revenues	-	-	-	$122,259	$131,581	$141,614	$152,412	$164,034
Total **Eligible** O&M and Ongoing Capital/Rehabilitation Costs (including returns to agency, if applicable)	-	-	-	$100,000	$105,063	$110,447	$116,176	$172,275
Federal Reimbursement of Availability Payment %	-	-	-	$136,519	$150,171	$165,188	$181,706	$199,877
Free Cash Flow	**-$650,000**	**-$325,000**	**-$325,000**	**$158,778**	**$176,689**	**$196,355**	**$217,942**	**$191,636**
Discount Factor (1/(1+r)^n)	1.00	0.91	0.83	0.75	0.68	0.62	0.56	0.51
Discounted Cash Flows	**-$650,000**	**-$295,455**	**-$268,595**	**$119,292**	**$120,681**	**$121,921**	**$123,023**	**$98,339**
Cumulative Discounted Cash Flow	-$650,000	-$945,455	-$1,214,050	-$1,094,758	-$974,076	-$852,156	-$729,133	-$630,793

-

Financial Performance Indicators	Values	
NPV (Net Present Value)	**$0**	**Over duration of this projection.*
IRR (Internal Rate of Return)	**10.00%**	**Discount rate needed to make NPV = 0. If blank, refer to guidebook.*
Discounted Payback period (years)	**12.00**	**Discounted Payback Period = Years Until Break-Even + (Unrecovered PV at the Start of the Recovery Year/PV of Cash Flow i*

Figure 19: Example of FAST's Discounted Cashflow Performance Based Outputs found on the DCF Tab.

Using a grant-based approach, there is an additional cell called "Optimal Subsidy Adjustment". The "Optimal Subsidy Adjustment" is the amount of upfront grant that is either needed or in excess of what is needed for the project to break even. In the instance where the sum of the free cash flows, or NPV of cash flows, exceeds the grant amount, then the project is seen as not needing any grants to yield an IRR greater than the required rate of

return. The IRR (post subsidy adjustment) should always equal the set discount rate, apart from exceptionally high revenues.

Discounted Cashflow Analysis: Grant Based Approach

DCF Table - Grant Based P3	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Initial Capital Expenditures	$650,000	$325,000	$325,000					
Operating Income				$22,259	$26,519	$31,167	$36,236	-$8,241
Grants	$520,000	$260,000	$260,000	$0	$0	$0	$0	$6,593
Free Cash Flow	**-$130,000**	**-$65,000**	**-$65,000**	**$22,259**	**$26,519**	**$31,167**	**$36,236**	**-$1,648**
Discount Factor (1/(1+r)^n)	1.00	0.91	0.83	0.75	0.68	0.62	0.56	0.51
Discounted Cash Flows	**-$130,000**	**-$59,091**	**-$53,719**	**$16,723**	**$18,113**	**$19,352**	**$20,454**	**-$846**
Cumulative Discounted Cash Flow	-$130,000	-$189,091	-$242,810	-$226,086	-$207,974	-$188,621	-$168,167	-$169,013

Financial Performance Indicators	Values	
NPV (Net Present Value)	**-$51,062**	*Over duration of this projection.
IRR (Internal Rate of Return)	**6.54%**	*Discount rate needed to make NPV = 0. If blank, refer to guidebook.
Discounted Payback period (years)	**N/A**	*Discounted Payback Period = Years Until Break-Even + (Unrecovered PV at the Start of the Recovery Year/PV of Cash Flow i
NPV of Grants (Milestone/Progress Payments)	**$974,623**	

Financial Performance Indicators - Post Subsidy Adjustment	Values
Optimal Subsidy Adjustment (Overpayment (-) or Underpayment (+))	**$51,062**
NPV of Grants (Milestone/Progress Payments) Post Adjustment	**$1,025,685**
IRR (Post Subsidy Adjustment)	**10.00%**

Free Cash Flows After Subsidy Adjustment	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Free Cash Flow	-$78,938	-$65,000	-$65,000	$22,259	$26,519	$31,167	$36,236	-$1,648
Discounted Cash Flows	-$78,938	-$59,091	-$53,719	$16,723	$18,113	$19,352	$20,454	-$846
Cumulative Discounted Cash Flow	-$78,938	-$138,029	-$191,748	-$175,024	-$156,912	-$137,559	-$117,105	-$117,951

Figure 20: Example of FAST's Discounted Cashflow Grant Based Outputs found on the DCF Tab.

A Minimum Revenue Guarantee structure may be used in cases where the baseline revenue forecast suggests that the EVCI project could potentially be financially viable without a government contribution, but the forecast is highly uncertain. In other words, the baseline forecast could result in an NPV close to but above 0.

You may test the MRG structure using the example in the tool. To achieve a financially viable revenue forecast for the example in the tool, change the revenue inputs such that revenues are boosted. There are various approaches to accomplish this, such as manually overriding input revenues to be greater, or boosting the Demand Estimate using the override function, increasing the number of EV ports, occupancy, or Demand Growth Rate. For example, you may use the user override in the Demand Estimate to 40,000 annual visits in the Inputs – Constant Tab, which will give you an NPV that is positive in a Baseline scenario. Then select Minimum Revenue Guarantee in the P3 Scenario Selector, ensure that the Revenue Scenario is set to Pessimistic at 70%, ensure that the Minimum Revenue Guarantee section of Revenue Structures in the Inputs – Time Series tab has an input of 80%. and observe the results in the DCF and Outcomes Dashboard tab. The IRR is the rate of return from the free cash flows including the government contribution needed, and the IRR post adjustment is a scenario in which an additional upfront subsidy (in year 0) would be needed for the project to break even if the MRG % is too low, or the amount overpaid by the government contribution if the MRG % is too high.

Discounted Cashflow Analysis: Minimum Revenue Guarantee (MRG) Approach

DCF Table - Minimum Revenue Guarantee	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Total **Eligible** Capital Expenditures	$650,000	$325,000	$325,000	-	-	-	-	-
Revenues				$310,145	$333,793	$359,245	$386,637	$416,118
Total **Eligible** O&M and Ongoing Capital/Rehabilitation Costs (inlcuding returns to agency, if applicable)	-	-	-	$100,000	$105,063	$110,447	$116,176	$172,275
Minimum Revenue Guarantee				$0	$0	$0	$0	$0
Free Cash Flow	**-$650,000**	**-$325,000**	**-$325,000**	**$210,145**	**$228,731**	**$248,798**	**$270,461**	**$243,843**
Discount Factor (1/(1+r)^n)	1.00	0.91	0.83	0.75	0.68	0.62	0.56	0.51
Discounted Cash Flows	**-$650,000**	**-$295,455**	**-$268,595**	**$157,885**	**$156,226**	**$154,484**	**$152,668**	**$125,130**
Cumulative Discounted Cash Flow	-$650,000	-$945,455	-$1,214,050	-$1,056,165	-$899,939	-$745,455	-$592,787	-$467,657

Financial Performance Indicators	Values	
NPV (Net Present Value)	**$256,382**	**Over duration of this projection.*
IRR (Internal Rate of Return)	**13.24%**	**Discount rate needed to make NPV = 0. If blank, refer to guidebook.*
Discounted Payback period (years)	**10.19**	**Discounted Payback Period = Years Until Break-Even + (Unrecovered PV at the Start of the Recovery Year/PV of Cash Flow i*
NPV of MRG	**$0**	

Financial Performance Indicators - Post Subsidy Adjustment	Values	
Optimal Subsidy Adjustment (Overpayment (-) or Underpayment (+))	-$256,382	
NPV of MRG Post Adjustment (In the Present)	-$256,382	**This is assuming a lump sum adjustment in the present phase - it is not the same as the NPV after finding the MRG percentage*
IRR (Post Subsidy Adjustment in the Present)	10.00%	**Objective is required rate of return or set discount rate.*

Free Cash Flows After Subsidy Adjustment	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Free Cash Flow	-$906,382	-$325,000	-$325,000	$210,145	$228,731	$248,798	$270,461	$243,843

Figure 21: Example of FAST's Discounted Cashflow for Minimum Revenue Guarantees found on the DCF Tab.

TAB 8: The **Outcomes Dashboard** contains statistics and charts summarizing key financial data relevant to the EVCI Project. This is segmented into Key Project Data, Performance Based P3 Data, Grant Based P3 Data, and Minimum Revenue Guarantee Data. Charts showing results for annual values of costs, revenues, cash flows, and operating income are provided.

Summary Data:

Key Project Data	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Revenues				$310,145	$333,793	$359,245	$386,637	$416,118
Total (Eligible) Project Costs	$650,000	$325,000	$325,000	$100,000	$105,063	$110,447	$116,176	$172,275
Total Returns to the Agency (Upside Revenue Share + Additional Returns)				$0	$0	$0	$0	$0

Net Present Values of Key Data	Values
Revenues (NPV)	$2,116,320
Total (Eligible) Project Costs (NPV)	$1,859,938
Returns to Agency (NPV)	$0

Figure 22: Example of FAST's Summary Key Project Data Outputs found on the Outcomes Dashboard Tab.

Performance Based P3	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Availability Payments	-	-	-	$136,519	$150,171	$165,188	$181,706	$199,877
Federal Reimbursment	-	-	-	$136,519	$150,171	$165,188	$181,706	$199,877
Non-Federally Reimbursed Amount	-	-	-	$0	$0	$0	$0	$0

-

Net Present Values of Key Data	Values
NPV of Cash Flows	$0
Federal Reimbursement (NPV)	$1,025,685
Non-Federal Reimbursement (NPV)	$0
IRR	10.00%
AP Ratio (NPV of Availability Payments/NPV of Total Eligible Costs)	55%

Figure 23: Example of FAST's Summary Performance Based P3 Outputs found on the Outcomes Dashboard Tab.

Grant Based P3	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Grants (Milestone/Progress Payments)	$520,000	$260,000	$260,000	$0	$0	$0	$0	$6,593

-

Net Present Values of Key Data	Values
NPV of Cash Flows	-$51,062
IRR Before Any Adjustment	6.54%
Grant or Subsidy (NPV) Before Adjustment	$974,623
Subsidy Overpayment (-) or Underpayment (+) NPV	$51,062
Subsidy (NPV) After Adjustment	$1,025,685
IRR After Adjustment	10.00%

Figure 24: Example of FAST's Summary Grant Based P3 Outputs found on the Outcomes Dashboard Tab.

Minimum Revenue Guarantee (MRG)	Planning and Construction Year 0	Planning and Construction Year 1	Planning and Construction Year 2	Operational Year 3	Operational Year 4	Operational Year 5	Operational Year 6	Operational Year 7
Minimum Revenue Guarantee Amount				$38,768	$41,724	$44,906	$48,330	$52,015

-

Net Present Values of Key Data	Values
NPV of Cash Flows	$256,382
NPV of Govt. Contribution to Meet MRG	$264,540
IRR Before Adjustment	13.24%
Subsidy Overpayment (-) or Underpayment (+)	-$256,382

Figure 25: Example of FAST's Summary Minimum Revenue Guarantee Outputs found on the Outcomes Dashboard Tab.

Figure 26: Example of FAST's Nominal Costs Vs. Project Year graph found on the Outcomes Dashboard Tab.

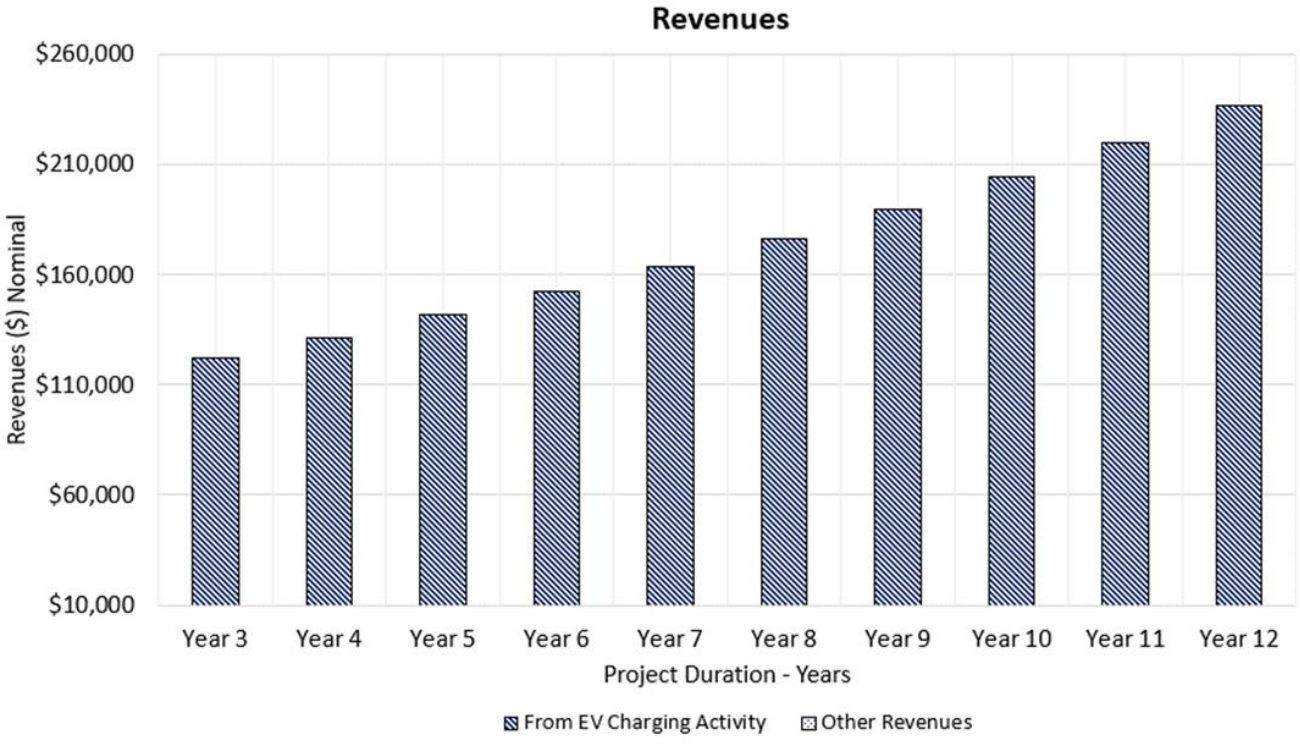

Figure 27: Example of FAST's Nominal Revenues Vs. Project Year graph found on the Outcomes Dashboard Tab.

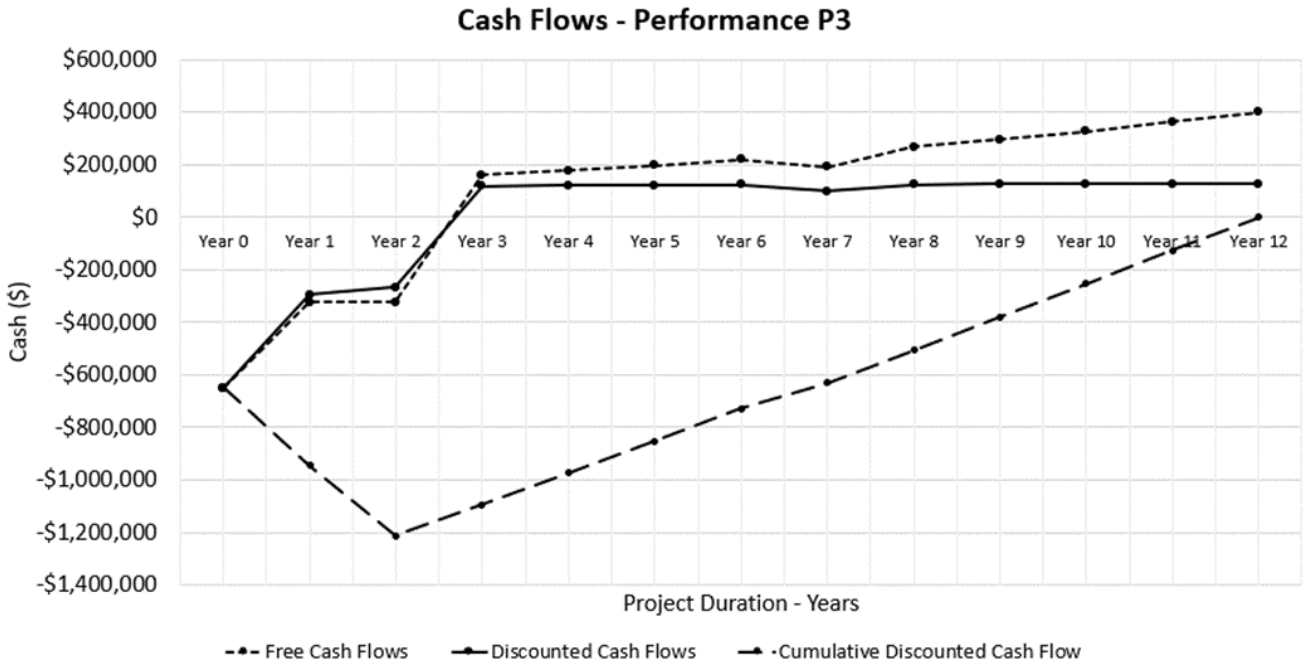

Figure 28: Example of FAST's Performance Based P3 Cash ($) Vs. Project Year graph found on the Outcomes Dashboard Tab.

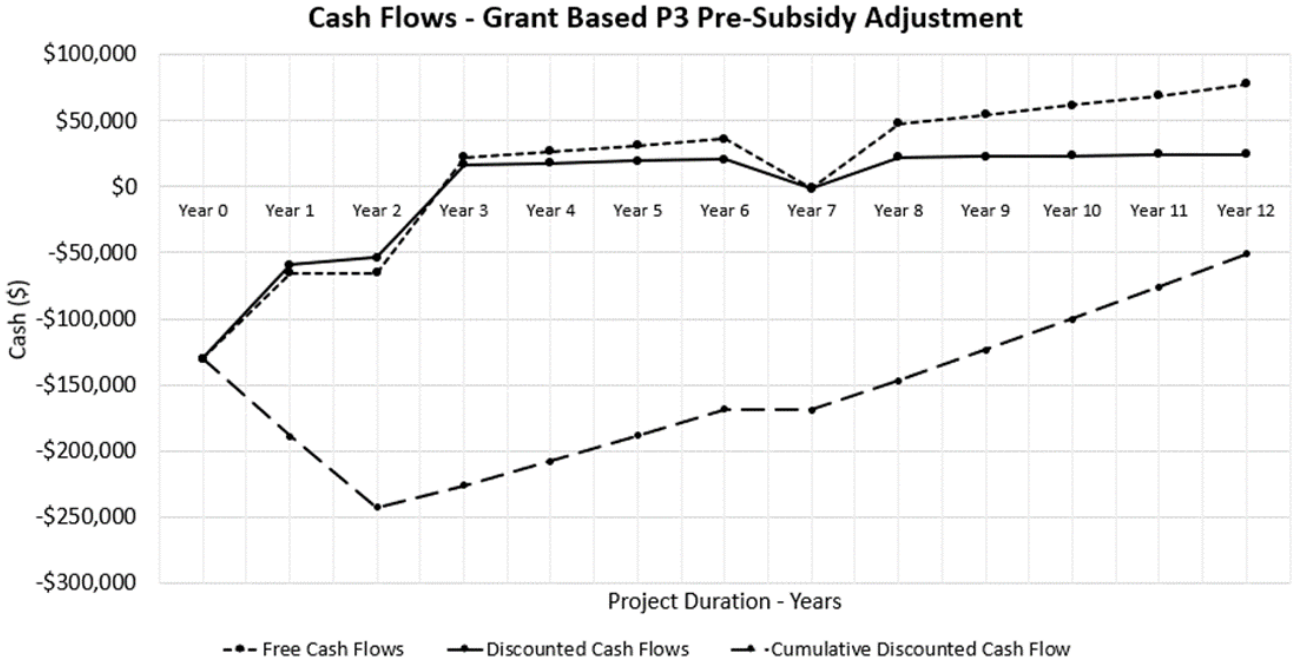

Figure 29: Example of FAST's Grant Based (Pre-Adjustment) Cash ($) Vs. Project Year graph found on the Outcomes Dashboard Tab.

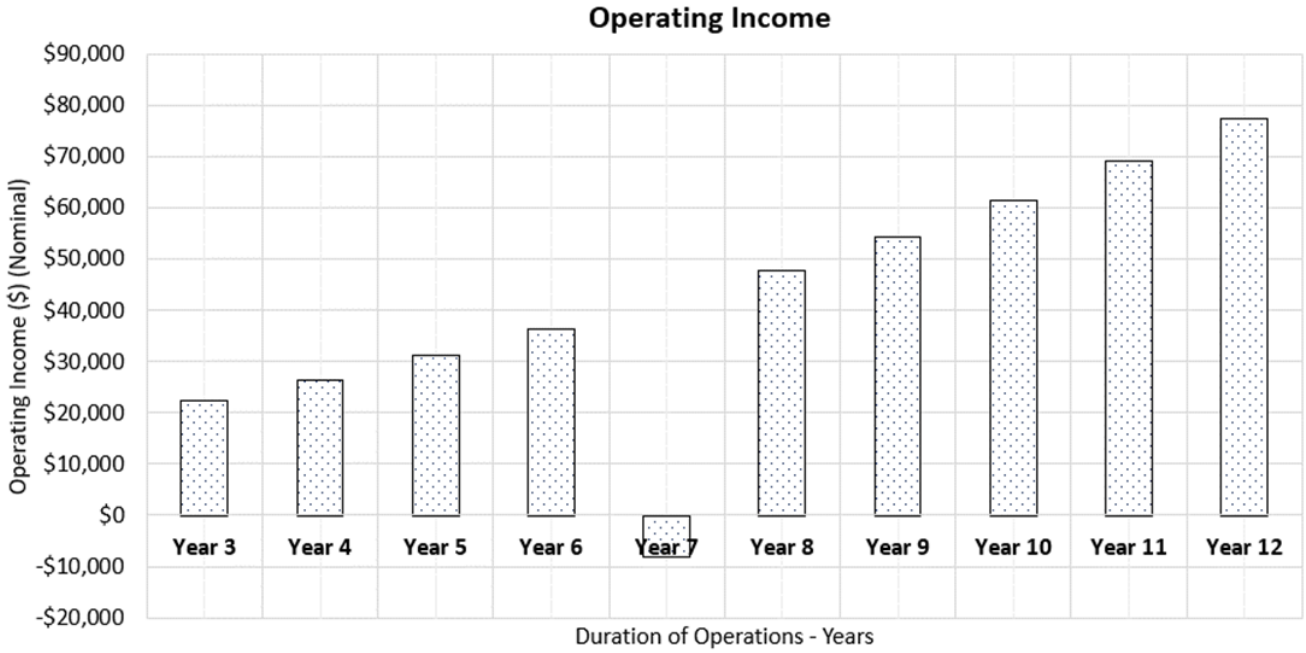

Figure 30: Example of FAST's Nominal Operating Income Vs. Project Year graph found on the Outcomes Dashboard Tab.