Northern California Power Agency

August 2022

Finance Committee Materials

PFM Financial Advisors LLC

601 S. Figueroa Street

Suite 4500

Los Angeles, CA 90017

213.489.4075

Report on Current Financial Market Conditions or Issues

Data, rates, and related statistics and charts are as of August 2, 2022, unless otherwise indicated

Market Overview Since May 10th

Date	DJIA	10-Yr MMD	10-Yr Tsy	30-Yr MMD	30-Yr Tsy
10-May	32,161	2.88%	2.99%	3.21%	3.12%
17-Jun	29,889	2.91%	3.25%	3.38%	3.30%
Δ	-2,272	0.03%	0.26%	0.17%	0.18%

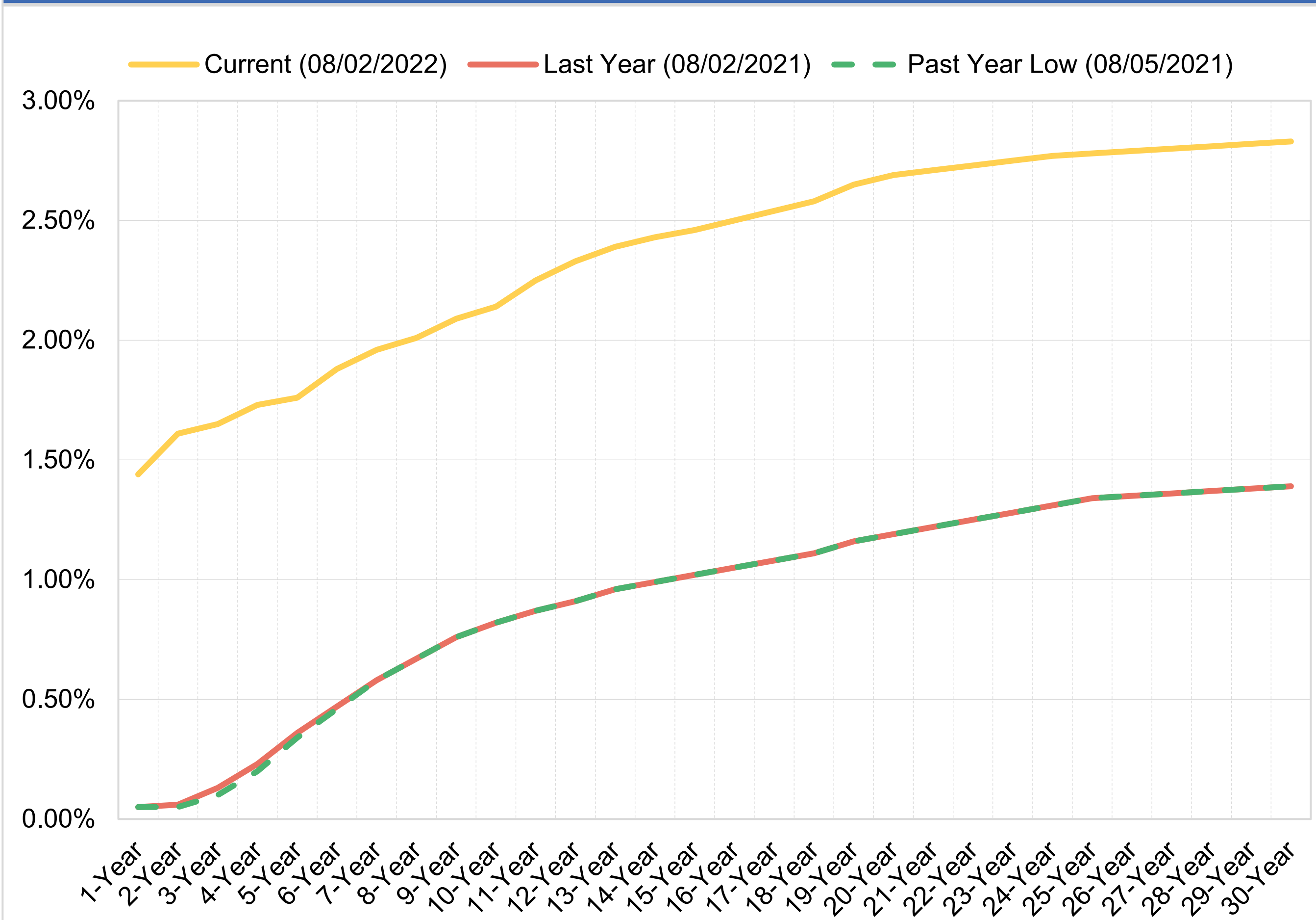
- At the May FOMC meeting, the central bank raised the Fed funds rate by 50bps.
  - Powell's comments that the Fed was not considering a 75bps rate hike in June temporarily eased market fears of more aggressive Fed monetary policy.
  - However, hawkish sentiments returned in June as strong labor data led to market expectations for tighter Fed monetary policy. In June, the Fed increased the funds rate by 75bps.

Date	DJIA	10-Yr MMD	10-Yr Tsy	30-Yr MMD	30-Yr Tsy
17-Jun	29,889	2.91%	3.25%	3.38%	3.30%
2-Aug	32,396	2.14%	2.75%	2.83%	3.00%
Δ	2,507	-0.77%	-0.50%	-0.55%	-0.30%

- July saw modest positive momentum in the municipal market, with rates moving tighter across the curve, despite US treasuries continuing to remain volatile with large intraday swings.
  - June CPI released in mid-July rose to 9.1%, the highest since 1981, causing some investors to start projecting a 100bps rate hike at the July FOMC meeting.
- Recessionary fears have continued to incite a flight to quality, causing UST rates to move lower.
- At the July FOMC meeting, the Fed increased the funds rate by another 75bps, as anticipated
  - The 2-year and 10-year treasury remain inverted, and the 10-year note slipped further to below 2.8%, the lowest level in two months

Recent AAA MMD Yield Curve Movement

AAA MMD Yield Curve Movement

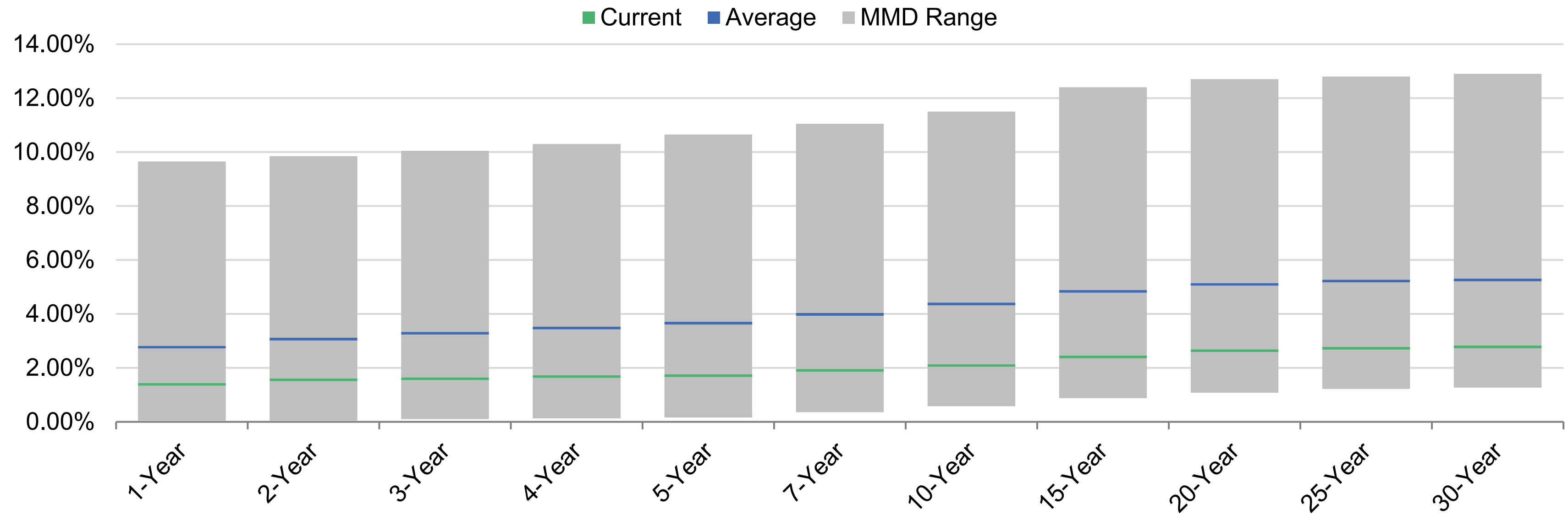


Maturity	∆ Since 08/02/2021	∆ Since 08/05/2021
1-Year	1.39%	1.39%
2-Year	1.55%	1.56%
3-Year	1.52%	1.55%
4-Year	1.50%	1.53%
5-Year	1.40%	1.42%
6-Year	1.41%	1.42%
7-Year	1.38%	1.38%
8-Year	1.34%	1.34%
9-Year	1.33%	1.33%
10-Year	1.32%	1.32%
11-Year	1.38%	1.38%
12-Year	1.42%	1.42%
13-Year	1.43%	1.43%
14-Year	1.44%	1.44%
15-Year	1.44%	1.44%
16-Year	1.45%	1.45%
17-Year	1.46%	1.46%
18-Year	1.47%	1.47%
19-Year	1.49%	1.49%
20-Year	1.50%	1.50%
21-Year	1.49%	1.49%
22-Year	1.48%	1.48%
23-Year	1.47%	1.47%
24-Year	1.46%	1.46%
25-Year	1.44%	1.44%
26-Year	1.44%	1.44%
27-Year	1.44%	1.44%
28-Year	1.44%	1.44%
29-Year	1.44%	1.44%
30-Year	1.44%	1.44%

Source: Refinitiv TM3

AAA MMD Position Since Inception

AAA MMD Rate Position
(June 8, 1981, Inception to August 2, 2022)



Summary of August 2, 2022 vs. Historical (since Inception) MMD Rates

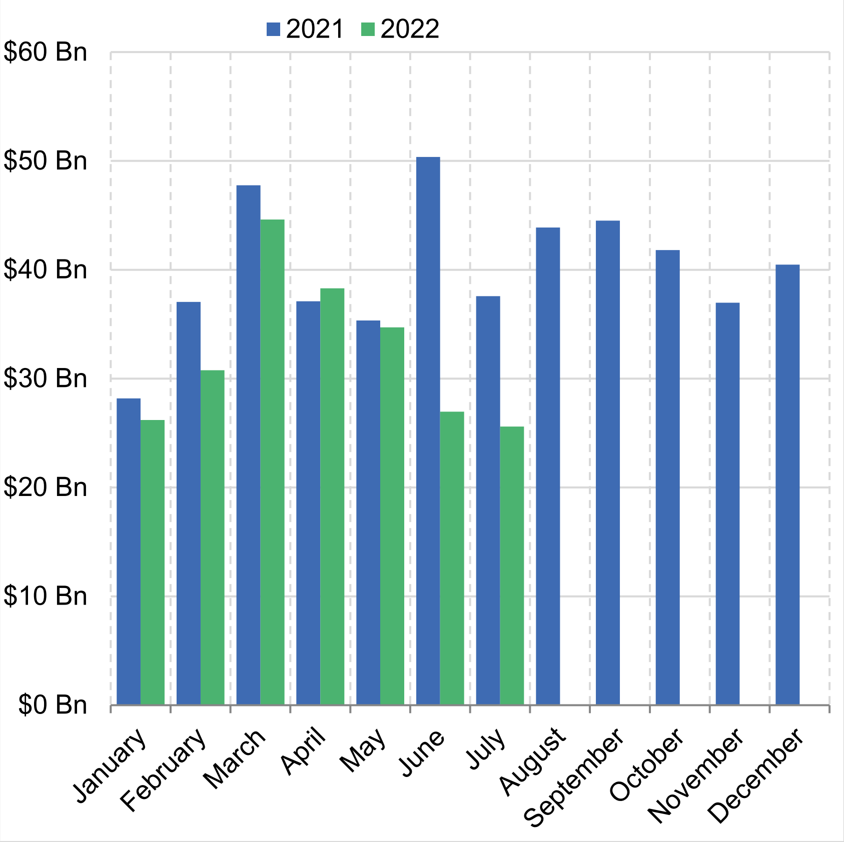
Statistic	1-Year	2-Year	3-Year	4-Year	5-Year	7-Year	10-Year	15-Year	20-Year	25-Year	30-Year
August 2, 2022	1.44%	1.61%	1.65%	1.73%	1.76%	1.96%	2.14%	2.46%	2.69%	2.78%	2.83%
Historical Average	2.82%	3.12%	3.34%	3.53%	3.71%	4.04%	4.42%	4.89%	5.15%	5.27%	5.31%
Spread to Average	-1.38%	-1.51%	-1.69%	-1.80%	-1.95%	-2.08%	-2.28%	-2.43%	-2.46%	-2.49%	-2.48%
Minimum	0.05%	0.05%	0.10%	0.13%	0.16%	0.36%	0.58%	0.88%	1.08%	1.22%	1.27%
Maximum	9.65%	9.85%	10.05%	10.30%	10.65%	11.05%	11.50%	12.40%	12.70%	12.80%	12.90%
% of Time Lower	33.62%	33.28%	30.78%	29.22%	26.92%	23.09%	17.02%	14.61%	14.10%	12.39%	12.03%

Source: Refinitiv TM3

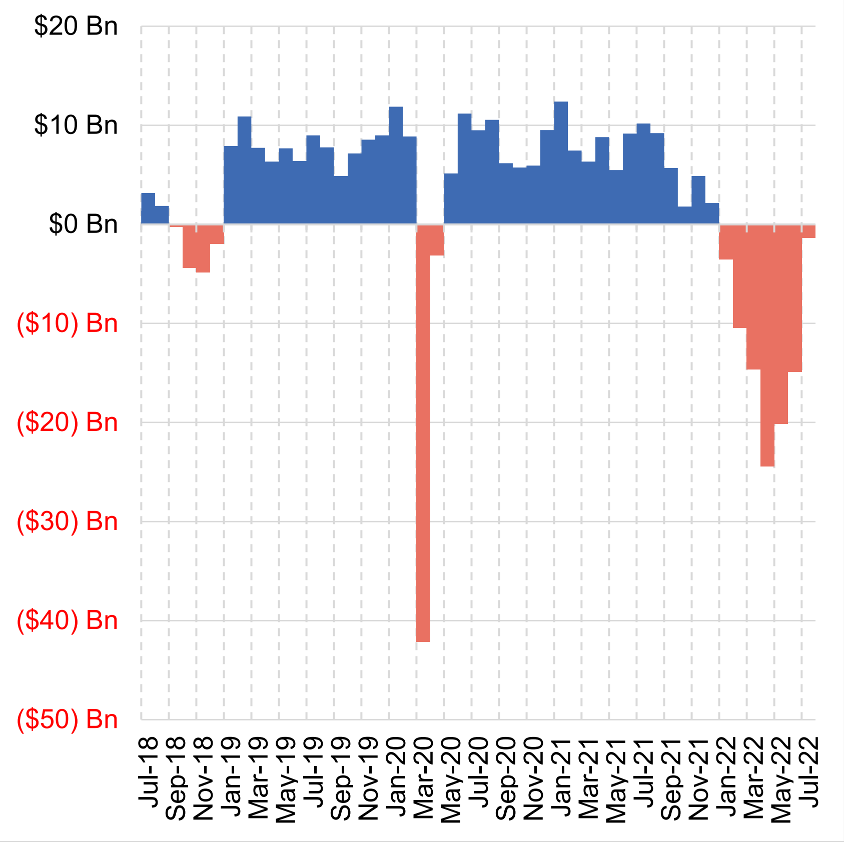
Municipal Market Supply & Demand

- Municipal bond funds saw small inflows the week ending 7/13 – the first inflow in 5 weeks – but outflows continued the following weeks. New issuance volume was down 31.9% year-over-year in July, and year-to-date new issuance volume was 16.9% lower than 2021 issuance through July.

Overall Municipal Market Volume (Supply)



Municipal Fund Flows (Demand)



Source: Bond Buyer, Investment Company Institute

Interest Rate Forecasts

- While the market currently still anticipates multiple rate hikes for the rest of this year, forecasted rate growth is slowing.

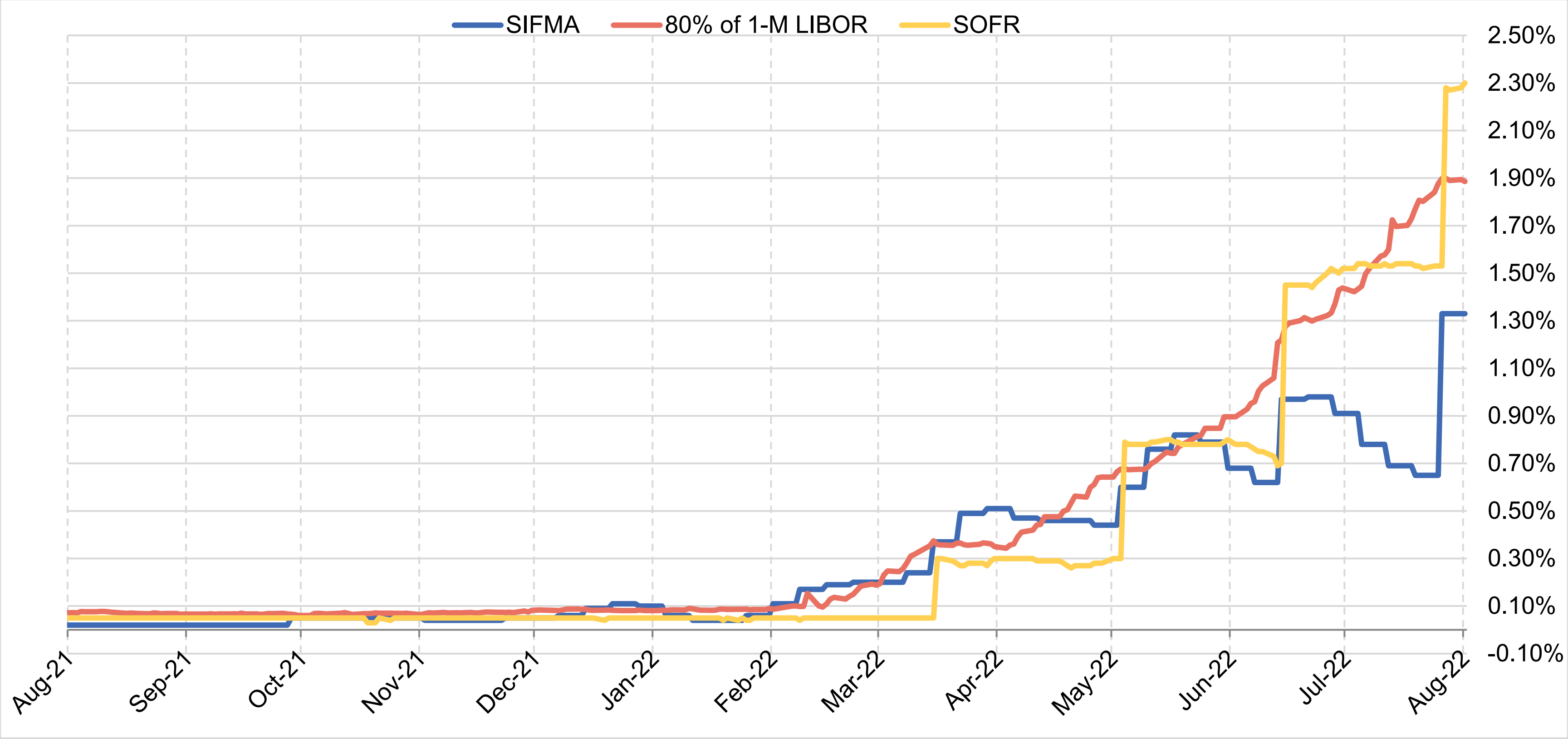
The Street's Interest Rate Forecast (As of August 3, 2021)								
Average Forecasts	**Current**	**Q3 22**	**Q3 Δ vs. Current**	**Q4 22**	**Q1 23**	**Q2 23**	**Q3 23**	**Q4 23**
30-Year UST	2.94%	3.37%	0.43%	3.42%	3.40%	3.37%	3.30%	3.25%
10-Year UST	2.60%	3.30%	0.70%	3.30%	3.29%	3.23%	3.15%	3.09%
2-Year UST	2.90%	3.31%	0.41%	3.41%	3.40%	3.27%	3.10%	3.01%
3M SOFR	2.56%	2.84%	0.28%	3.30%	3.45%	3.45%	3.21%	2.97%
Fed Funds Target Rate	2.25%	2.80%	0.55%	3.31%	3.41%	3.35%	3.16%	3.06%
Fed Funds Δ Since May Meeting	*2.00%*	*1.14%*		*1.27%*	*1.06%*	*0.85%*	*0.62%*	*0.53%*

Source: Bloomberg

SOFR, SIFMA & 1-Month LIBOR Rate Movement

- While 1-M LIBOR has experienced steady growth since February, SOFR has seen jumps in line with Fed rate hikes. Meanwhile, SIFMA increased by 35 bps following the June FOMC meeting and jumped by 68 bps following the July FOMC meeting.

SOFR, SIFMA & 1-Month LIBOR Rate Movement
(1-Year History)



Source: Refinitiv TM3

Potential Impacts to Build America Bonds Subsidy

- On June 21st, 14 members of the Public Finance Network (PFN) – including APPA – provided a letter to Congress voicing concern that, unless new legislation is enacted to waive the PAYGO Act connected to the American Rescue Plan, various subsidy programs could be impacted
  - Includes BABs, QSCBs, QZABs, New CREBs and QECBs
  - Unless the PAYGO Act is waived, subsidy payments will be eliminated in 2023 through 2026.
- The item will likely not be addressed until after November elections, but historically Congress has taken legislative action at the end of the calendar year to waive the PAYGO scorecard
- NCPA Lodi Energy Center Project currently has two series of BABs: the Issue One 2010 Series B BABs (Indenture Group A) and the Issue Two 2010 Series B BABs (Indenture Group B)
  - Should NCPA lose the BAB subsidy in 2023 through 2026, NCPA would have to pay ~$12.8 million in additional interest on the Indenture Group A BABs and ~$5 million in additional interest on the Indenture Group B BABs
- PFM evaluated a potential refunding of both series of BABs, should the subsidy be eliminated in 2023 through 2026:
  - A refunding of the Indenture Group A BABs would not be economic, generating over $13.5 million in dissavings
  - A refunding of the Indenture Group B BABs generates marginal NPV savings of ~$3 million, representing 3% of refunded par

Assumptions: Rates as of 8/1/2022, A1/A-/A ratings for Issue One BABs, Aa2/AAA/- ratings for Issue Two BABs, reserve release of $10.6M included as additional source for refunding of Issue One BABs. Savings assume 1) no subsidy through 2026, 2) 5.7% sequestration from 1/1/2027 through 9/30/2030, and 3) full 35% subsidy after 9/30/2030.

pfm