

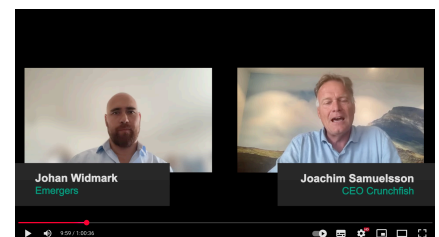
# Crunchfish: Improved outlook with NPCI adoption and global validation

Johan Widmark | 2025-08-25 08:00

**Crunchfish's new go-to-market strategy for offline payments, splitting the solution into terminals for payment networks and wallets for payment service providers, appears to have found traction. The approach has been received positively in India, with NPCI now implementing it into their payment rails, opening the door to scale Digital Cash wallets across the ecosystem. Global recognition from institutions such as the IMF and Bank of Canada further validates the model, while the company continues to work to secure financing. Following a revision of our model, we now find support for an rNPV of SEK 3.2 (2.3) per share, still based on crude assumptions, but with support from improved industry feedback.**

## From whole systems to modular adoption

Crunchfish's earlier pilots in India highlighted the critical obstacle to scaling offline payments: no single actor wanted to buy into a complete, monolithic solution. The new iteration directly addresses this by separating the product into two parts: an Offline Terminal Infrastructure and Digital Cash wallets, which ensures that once the network side is enabled to receive offline payments, every PSP on that rail becomes a potential wallet customer. To accelerate adoption, Crunchfish is offering terminal capabilities for free to payment networks, betting that revenues will come from the sale of wallets to PSPs at scale. The fact that NPCI – India's key payment infrastructure operator – has embraced this structure represents a turning point, providing Crunchfish with the launchpad it previously lacked.



**Watch the lunch talk with CEO Joachim Samuelsson (in Swedish) [here](#)**

## Industry validation and new use cases

Beyond India, Crunchfish is widening its reach into global opportunities. The IMF recently highlighted the challenges of hardware-based offline CBDC solutions, echoing Crunchfish's argument for wallet-led architectures. The Bank of Canada, in a retail CBDC feasibility study, recommended a two-phase commit architecture for transaction integrity – essentially identical to Crunchfish's long-standing Reserve, Pay, and Settle model. Additional partnerships, such as with the Central Banking Standards Organization, further integrate the company's design into emerging global frameworks. Meanwhile, Crunchfish is also rethinking cash and online payments: pilots are being prepared with a fintech serving 200,000 merchants in India for digital change in cash transactions, and new wallet features are aimed at strengthening authentication and resilience in online payments.

## Financing needs remain: rNPV of SEK 3.2 (2.3) per share

At the end of Q2'25, Crunchfish's cash at SEK 13.2m remain below expected OPEX for the year, and absent near-term commercial revenues the company will require additional financing to extend runway into 2027. Options beyond shareholder dilution are reportedly under discussion. Our rNPV model continues to assume 11 PSPs and 160m upfront paid users by 2028, with value capture tapering under pricing pressure, discounted at 24% with a 25% success probability. The exercise of TO11 increased the share count by 8.3m, yet the strong rally in the share price over the summer to SEK 3.80 provides a more favourable starting point for potential equity financing. Assuming a 40% discount in a future raise, the expected dilution in our model is now markedly lower than before. As a result, our rNPV estimate rises from SEK 2.3 to SEK 3.2 per share. We emphasise, however, that this remains based on assumptions with considerable uncertainty. While the equity case retains the profile of a high-risk option, industry validation from leading institutions and NPCI's adoption of the new architecture add credibility to the possibility that Crunchfish could finally be on the path toward a viable commercial model.

## Crunchfish

Current Price, SEK	3.80
Shares (M)	73.8
Market Capitalisation (MSEK)	281
Net Debt (+) / Cash (-) (MSEK)	-14.1
Enterprise Value (MSEK)	267
Market	First North



## Crunchfish rNPV model

rNPV	2025E	2026E	2027E	2028E	2029E	2030E	Terminal Value
<b>Total Users (m)</b>	<b>2.5</b>	<b>20.3</b>	<b>73.5</b>	<b>164.8</b>	<b>332.8</b>	<b>506.0</b>	
New licenses	2.5	17.8	53.3	91.3	168.0	173.3	
Renewals (2y)	0.0	0.0	2.5	17.8	55.8	109.0	
<b>Invoiced licenses</b>	<b>2.5</b>	<b>17.8</b>	<b>55.8</b>	<b>109.0</b>	<b>223.8</b>	<b>282.3</b>	
ARPU, SEK (for 2y upfront)	3.6	3.2	2.8	2.5	2.2	1.9	
<b>Annual Revenue</b>	<b>9.0</b>	<b>56.8</b>	<b>156.2</b>	<b>267.4</b>	<b>482.1</b>	<b>544.3</b>	G: 5%
OPEX	-30.2	-36.2	-43.4	-52.1	-62.5	-68.8	r: 24%
<b>EBIT</b>	<b>-21.2</b>	<b>20.6</b>	<b>112.8</b>	<b>215.3</b>	<b>419.6</b>	<b>475.5</b>	
CAPEX	-0.5	-0.5	-0.6	-0.6	-0.6	-0.6	
Deferred Paym & Earn-out						0.0	
Tax	0.0	0.0	0.0	-33.7	-83.9	-95.1	
<b>FCF</b>	<b>-21.7</b>	<b>20.1</b>	<b>112.3</b>	<b>181.0</b>	<b>335.1</b>	<b>379.8</b>	2077
Discount factor 24%							
Discount Period	1	2	3	4	5	6	7
Discount factor	1.000	0.805	0.648	0.522	0.420	0.338	0.272
PV	-22	16	73	94	141	128	566
<b>NPV</b>	<b>996.9</b>						
Likelihood of Success	25%						
<b>rNPV</b>	<b>249.2</b>						
Current Number of Shares	73.8						
Equity raise 2025/2026, SEKm	35						
Discount at rights issue	40%						
New shares in rights issue	15.4						
Fully Dilluted NOS post issue	89.2						
<b>rNPV per Share</b>	<b>3.2</b>						

Source: Emergers

## Crunchfish rNPV Key Model Assumptions

PSPs and End users at full rollout							Average customers (m)
	Roll-out coverage at full scale	2025E	2026E	2027E	2028E	2029E	2030E
<b>Number of PSPs</b>							
Large PSPs (>100m )	50%			1	2	3	4
Mid PSP (10-100m)	50%	1	2	3	4	5	6
Small PSP (<10m)	50%	1	2	3	5	8	14
<b>ARPU per PSP (2y term)</b>							
Large PSPs (>100m )				2.5	2.3	2.0	1.8
Mid PSP (10-100m)		3.5	3.2	2.8	2.6	2.3	2.1
Small PSP (<10m)		4.0	3.6	3.2	2.9	2.6	2.4
<b>Roll-out of end users (Estimated to be 20% y1, 50% y2 and 100% y3)</b>							
Large PSPs (>100m )				15.0	67.5	195.0	322.5
Mid PSP (10-100m)		2.0	18.0	52.0	86.0	120.0	154.0
Small PSP (<10m)		0.5	2.3	6.5	11.3	17.8	29.5
<b>Sum</b>		<b>2.5</b>	<b>20.3</b>	<b>73.5</b>	<b>164.8</b>	<b>332.8</b>	<b>506.0</b>

Source: Emergers

### Discount rate

Equity Beta	Crunchfish
Unlevered beta	0.92
Debt to Total Capital (D/(D+E))	0.0%
Equity to Total Capital ratio (E/(D+E))	100.0%
Debt to Equity (D/E)	0.0%
Tax rate	22.0%
<b>Relevered beta</b>	<b>0.92</b>

### Capital Asset Pricing Model

Risk-free rate (20 yr. U.S. gov. bond yield)	5.0%
Market Risk Premium	10.0%
Size premium	10.0%
<b>Cost of equity</b>	<b>24.2%</b>
<b>WACC</b>	
Cost of Equity	24.2%
Pre-tax cost of debt	0.0%
Post-tax cost of debt	0.0%
% net debt	0.0%
<b>Discount Rate</b>	<b>24.2%</b>

Source: Emergers

## Addressing growing problems on a global scale

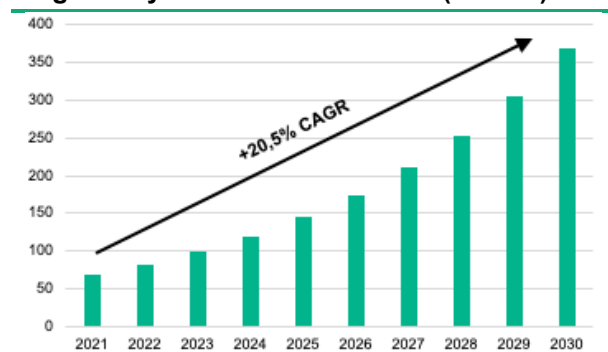
### Offline digital payments

Even though internet connectivity is good throughout the developed world, it doesn't work everywhere, all the time. Payment rails, built on circuit-switched systems, only works if everything else supporting it works, making modern societies vulnerable to IT-attacks, system failures or even just downtime maintenance.

Connectivity in general is a major concern in other parts of the world. In India for example, only about 50% of the 1,4 billion citizens enjoy a stable connection. The same goes for a country like Nigeria, where 70% of the population lives without solid internet connection.

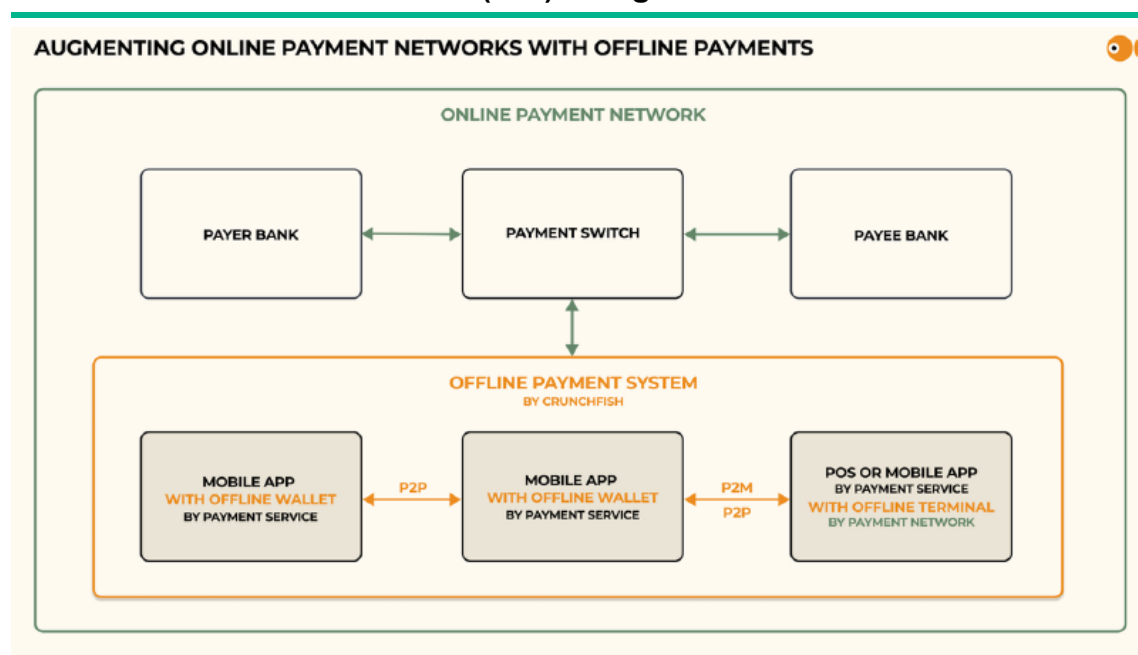
As internet connectivity varies a lot between regions, systems are prone to downtime, and internet connection has become a vital part of existing payment infrastructure, this adds up to a problem in urgent need of a solution. Despite the poor connectivity, India is the supreme leader in real-time payments, where over 74 billion transactions were made through UPI (India's version of Swish) in 2022 alone. This compares to the 4 billion transactions that has been made on Swedish Swish since the service launched in 2012.

### Digital Payments Market Growth (USDbn)



Source: Grandviewresearch, Emergers

## Offline Terminal Infrastructure (OTI) Design



Source: Crunchfish

### **IDFC First Bank Commercial Agreement**

On the 29<sup>th</sup> of June 2023 Crunchfish signed their first commercial agreement for its Digital Cash Offline-solution with IDCF First Bank. The first release to the bank's customers was launched in Q3 2023, and the initial use case was to enable offline UPI payments over the telecom network.

The 3-year license includes a first trench of users, out of a maximum of seven. Should IDFC Bank decide they want to offer the service to more of its customers, additional licenses will have to be purchased.

### **SaaS business model with high scalability**

As both of Crunchfish's verticals are fully based on software, the business is highly scalable by nature with high margins. With an annual OPEX currently at about SEK 40m per year (which the company expects to keep intact going forward), future profitability will be high should high volume deals be signed.

### **Risks**

**Unproven business model:** Even though one Digital Cash commercial deal has been signed, the business model, earning capacity and rollout-pace are still highly uncertain.

**Addressing a slow-moving market:** Crunchfish's business is focused on critical financial infrastructure, such as payment systems. We believe that even though the technology works, an investor needs to keep in mind that these institutions are slow to change and that a rollout might take longer than expected.

### **Corporate Governance**

**CEO of Crunchfish AB** Joachim Samuelsson has a Master of Science in industrial Engineering and Management from Linköping University. As a serial entrepreneur since 1996, Samuelsson has had successful engagements in ComOpt AB, Actix Ltd and Biomain AB. Before that Samuelsson worked several years for Ericsson in international technical and marketing roles.

**Chairman of the board** Göran Linder has a Master of Science in Engineering from KTH Royal Institute of Technology in Stockholm. Linder also serves as CEO of Corespring New Technology AB and serves on the board in Powercell AB, Promore Pharma AB, Minesto AB and QCG Sweden AB.

**CEO of Crunchfish Digital Cash AB** Patrik Lindeberg has a Master of Science in Electrical Engineering from Lund University and National University of Singapore, bringing experience in commercial and technical areas of responsibility.

## Crunchfish

### Income Statement

MSEK	2021	2022	2023	2024	2025E	2026E	2027E
Sales	4.0	6.2	1.0	3.0	9.0	56.8	156.2
Operating Costs	-49.3	-39.8	-46.1	-39.1	-30.2	-36.2	-43.4
EBITDA	-29.2	-18.1	-26.5	-21.0	-10.8	27.0	117.2
Depreciation	-7.7	-6.1	-22.8	-5.4	-2.0	-1.9	-1.8
Amortisation of Goodwill	0.0	0.0	0.0	0.0	1.0	1.0	1.0
EBIT	-36.9	-24.3	-49.4	-26.4	-11.8	26.1	116.4
Non-recurring Items	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Associated Companies	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Net Financial Items	-1.6	0.2	0.1	-0.1	-0.3	-0.3	-0.3
<b>Pre-tax Result</b>	<b>-38.5</b>	<b>-24.0</b>	<b>-49.3</b>	<b>-26.5</b>	<b>-12.0</b>	<b>25.9</b>	<b>116.2</b>
Tax	0.0	0.0	0.0	-0.1	0.0	-5.2	-23.8
Minority Interest	0.0	0.0	0.0	0.0	1.0	1.0	1.0
<b>Net Result</b>	<b>-38.5</b>	<b>-24.0</b>	<b>-49.3</b>	<b>-26.5</b>	<b>-11.0</b>	<b>21.7</b>	<b>93.4</b>

### Capital Expenditure

	2021	2022	2023	2024	2025E	2026E	2027E
Capital Expenditure, Absolute	15.8	13.6	1.2	0.0	-0.5	-2.8	-7.8
As a Pct of Sales	400%	220%	125%	0%	-5%	-5%	-5%
Depreciation Multiple	2.1	2.2	0.1	0.0	-0.2	-1.5	-4.3

### Key Ratios

Share Price: SEK 3.80

	2021	2022	2023	2024	2025E	2026E	2027E
Share Price at 31 Dec	25.00	20.00	7.00	1.18	3.80	3.80	3.80
Number of Shares (Millions)	30.93	33.04	39.65	57.51	73.84	73.84	73.84
Market Cap	773.1	660.8	277.5	67.9	280.6	280.6	280.6
Enterprise Value	740.9	631.9	248.2	51.5	275.0	251.1	141.9
EPS (Reported)	-1.24	-0.73	-1.24	-0.46	-0.18	0.27	1.24
EPS (Adjusted)	-1.24	-0.73	-1.24	-0.46	-0.18	0.27	1.24
CEPS	-1.24	-0.73	-1.24	-0.46	-0.18	0.27	1.24
P/CEPS	n.a.	n.a.	n.a.	n.a.	-21.5	14.3	3.1
Book Value/Share	1.8	1.8	1.3	0.8	0.5	0.7	2.0
P/BV	13.8	11.2	5.3	1.4	8.2	5.2	1.9
Dividend	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Dividend Yield (%)	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Dividend Payout Ratio (%)	0.0	0.0	0.0	0.0	0.0	0.0	0.0
EV/Sales	187.3	102.1	639.7	211.1	30.6	4.4	0.9
EV/EBITDA	-25.4	-34.9	-23.8	-30.1	-25.5	9.3	1.2
EV/EBIT	-20.1	-26.1	-12.8	-23.9	-23.4	9.6	1.2
P/E (Adjusted)	-20.1	-27.5	-5.6	-2.6	-21.5	14.3	3.1
Sales Growth, Y/Y (%)	-63.6	56.4	-84.0	203.0	200.7	531.1	175.1
EBIT Growth, Y/Y (%)	46.2	-34.2	103.6	-46.5	-55.4	-321.7	346.0
EPS Growth (Adjusted), Y/Y (%)	39.2	-41.5	71.0	-62.9	-61.8	-251.1	364.3
EBITDA Margin (%)	-738.2	-292.8	-2687.2	-702.3	-119.7	47.5	75.0
EBIT Margin (%)	-931.8	-392.0	-5000.1	-882.3	-130.8	46.0	74.5
Return on Equity (%)	-84.8	-41.9	-88.8	-53.4	-32.0	44.7	91.8
Tax Rate (%)	0.0	0.0	0.0	0.0	0.0	-20.8	-20.6

### Financial Position

	2021	2022	2023	2024	2025E	2026E	2027E
Interest-Bearing Net Debt	-32	-29	-29	-16	-6	-30	-139
Net Debt/Equity	-0.6	-0.5	-0.6	-0.3	-0.2	-0.5	-1.0
Equity Ratio	0.9	0.9	0.8	0.9	0.9	0.6	0.6
Net Debt/EBITDA	1.1	1.6	1.1	0.8	0.0	0.0	0.0

Source: Emergers, Company reports

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Johan Widmark | Tel: +46739196641 | Mail: [johan@emergers.se](mailto:johan@emergers.se)

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Emergers  
Incirrata AB  
Enbacken 16  
187 44 Täby  
Sweden

Phone: 0739 – 19 66 41  
Email: [johan@emergers.se](mailto:johan@emergers.se)  
Corp reg no: 556815-7837