FSRG VIRTUAL ASSETS SERIES

Hong Kong Legal and Regulatory Overview Fund Management Regulations Trends & Opportunities Central Bank Digital Currencies (CDBC)





FSRG Briefs Virtual Assets Series

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FSRG BRIEFS - VIRTUAL ASSETS

Hong Kong Virtual Assets - Legal and Regulatory Overview

1. Introduction

Contrary to the market's expectation that it would maintain its tight regulation of the virtual asset industry, during Hong Kong Fintech Week in October 2022, the Hong Kong government announced significant initiatives to open up the virtual asset industry to provide Hong Kong with a competitive edge as a virtual asset hub in the Asia region. While there have been a number of high profile events towards the end of 2022 which impacted the crypto market (and the confidence of investors towards this market), Hong Kong has not halted its grand ambition.

The city's securities regulator, the Securities and Futures Commission (SFC) has approved three virtual asset futures exchange traded funds (ETFs) and continued to approve "upgrade applications" for virtual asset fund managers. The Legislative Council of Hong Kong (LegCo) also passed the Anti Money Laundering and Counter Terrorist Financing (Amendment) Bill 2022 into law, which introduces a licencing regime for virtual asset service providers (VASPs) that will take effect in March 2023. We are seeing no signs of slowing down on the development of virtual assets laws and regulations in Hong Kong.

In this brief, we will give an overview of the legal and regulatory regime regarding virtual assets (VAs) in Hong Kong.

2. Virtual Asset Trading Platforms

Hong Kong was once home to some of the biggest crypto exchanges in the business. However, many industry players reconsidered the location of their headquarters when the SFC sent investigative letters to crypto exchanges in February 2018¹ and took regulatory actions against an initial coin offering (ICO) issuer in March 2018².

The story took a slight change of direction when the regulator issued a statement in November 2018³ that set out a conceptual framework for potential regulation of virtual asset trading platforms (VA Trading Platforms), which ultimately resulted in a position paper in November 2019⁴ that introduces a new opt in regulatory framework for VA Trading Platforms. This confirmed the SFC's willingness to license VA Trading Platforms under an existing framework applicable to licensed automated trading services providers and brokers, namely Type 1 (dealing in securities) and 7 (providing automated trading services) license (Type 1 and Type 7 License) (Regulatory Framework).

That said, it took more than a year for the first Type 1 and Type 7 License operator to obtain the license from the cautious regulator, and the second licensee only obtained its license in November 2022. This disheartened the Asia crypto industry and often the city was considered "unfriendly" to crypto, leaving many participants to avoid the jurisdiction wherever possible. This narrative has not changed even after

¹ https://apps.sfc.hk/edistributionWeb/gateway/EN/news-and-announcements/news/doc?refNo=18PR13

² https://apps.sfc.hk/edistributionWeb/gateway/EN/news-and-announcements/news/doc?refNo=18PR29

³ https://www.sfc.hk/en/News-and-announcements/Policy-statements-and-announcements/Statement-on-regulatory-framework-for-virtual-asset-portfolios-managers

 $^{^4} https://www.sfc.hk/web/EN/files/ER/PDF/App\%202_\%20 Conceptual\%20 framework\%20 for\%20 VA\%20 trading\%20 platform_eng.pdf$

the release of the conclusion to the Hong Kong government's public consultation on a proposed licencing regime for VASPs (VASP License) in May 2021.

The story really took a U-turn in Hong Kong Fintech Week 2022, where in a keynote speech (Fintech Week Keynote), Julia Leung, the then deputy chief executive officer and now chief executive officer of the SFC, indicated that the SFC will be launching a public consultation on whether retail investors should be able to access SFC licensed trading platforms, among other governmental initiatives, to promote Hong Kong as the Asia VA hub.

The city's LegCo has since then passed the amended Anti Money Laundering and Counter Terrorist Financing Ordinance (AMLO) into law to implement the VASP License regime. Industry players also became excited about the potential of being regulated by an internationally recognised regulator which is considering the provision of VASP services to retail investors, with some operators considering returning to Hong Kong for business.

In the last 12 months period, we have witnessed a full cycle of the crypto market, starting the year at a high and then sharply entering into bear market driven by chain of collapses of giants within the industry, yet the crypto market survives. 2022 was a year of reboot and learning of tough lessons. We see that crypto is no different to other asset classes. It is very volatile, can go up quickly, can also go down quickly; we see the current regulations/ licencing regimes elsewhere in the world focusing on AML/ KYC requirements falling well short of protecting crypto investors, users and communities. Some of the giants who failed during the crypto winter claimed to have been regulated and have robust internal controls, yet as things unravel, we see these companies had little or no appetite for risk management or internal control.

From a Hong Kong perspective, although many have said the city is too late in the crypto game and is playing catch up, in hindsight, Hong Kong has probably been correct in adopting a prudent approach to think through and roll out new virtual asset related policy initiatives. With the tough lessons learned from other countries and the recent announcements of crypto friendly initiatives and moves, Hong Kong is setting itself up well in 2023 and beyond to become once again one of the leading crypto hubs in the world attracting the best projects, talents to be based in Hong Kong.

Algorand Foundation

Now, in Hong Kong, we have two parallel regimes under which VA Trading Platforms can operate, namely the Type 1 and Type 7 License and the VASP License.

SFC Type 1 and Type 7 License

VA Trading Platforms that want to be licensed and regulated by the SFC must bring themselves within the regulator's ambit by offering for trading at least one VA that is a "security" (Security) as defined under the Securities and Futures Ordinance (SFO). VA Trading Platforms that trade only VA that are not Securities will remain outside of the regulator's purview.

The SFC is willing to accept licencing applications only from centralised VA Trading Platforms that have control over investors' assets. Licencing applications will not be accepted from decentralised VA Trading Platforms or VA Trading Platforms for direct peer to peer trading.

All Type 1 and Type 7 Licenses for VA Trading Platforms will be granted subject to several key conditions, described below:

- (a) *Professional Investors:* Type 1 and Type 7 License VA Trading Platforms may only provide services only to professional investors as defined under the SFO (Professional Investors).
- (b) *Terms & Conditions:* Type 1 and Type 7 License VA Trading Platforms must comply with the Terms and Conditions for Virtual Asset Platform Operators set out in the Regulatory Framework Type 1 and Type 7
 - For exchanges intending to apply for a license, some of the most challenging operational and business conditions are the requirements for full insurance coverage on hot/ cold wallet, personal account trading policy and Professional Investor only restrictions
- (c) SFC Approval: Type 1 and Type 7 License VA Trading Platforms must obtain prior written approval from the SFC for:
 - the addition of any product to the VA Trading Platform; and
 - the addition of any new service or activity or to materially change any existing service or activity.
- (d) Reporting: Type 1 and Type 7 License VA Trading Platforms must report to the SFC monthly on its business activities, and engage an independent professional firm vetted by the SFC to annually report on the Type 1 and Type 7 License VA Trading Platform's compliance with licencing conditions and other regulatory requirements.

Further, all VA trading business activities conducted by the operator of a Type 1 and Type 7 License VA Trading Platform and its group companies that are marketed to Hong Kong investors or conducted in Hong Kong must be carried out under a single legal entity that is licensed by the SFC to enable the SFC to exercise comprehensive oversight. This means that trading activities related to non Securities (which would otherwise be outside of the SFC's ambit) will also be subject to the SFC's purview and compliance with the Type 1 and Type 7 Framework.

The obligations and oversight of Type 1 and Type 7 License VA Trading Platform under the Regulatory Framework are both extensive and prescriptive. The high standards dictated by the SFC will require operators to deploy considerable resources in order to meet the licencing criteria and satisfy the continuing conduct requirements.

A table summarising the key features of the Type 1 and Type 7 Regulatory Framework is available in <u>Appendix A</u>.

VASP License

The Hong Kong government proposed a licencing regime for VASPs for which it released the conclusions of its public consultation in May 2021, which subsequently resulted in the Anti Money Laundering and Counter Terrorist Financing (Amendment) Bill 2022 in June 2022 that introduced amendments to the AMLO. In December 2022, LegCo passed the amended AMLO (Amended AMLO) into law.

The Amended AMLO designates the business of operating a "virtual asset service" as a "regulated function" and requires any person engaging in that activity to obtain a VASP license from the SFC. The VASP regime is primarily intended to capture the operation of a VA exchange. Other VA activities are presently not covered by the licencing regime given their negligible presence in Hong Kong, but the scope could be expanded by the Hong Kong government in the future if it considers necessary to do so.

Notably, the current definition of VASP will not cover pure decentralised VA exchanges. Licensed VASPs will also be required to comply with the existing requirements under the AMLO on customer due diligence, similar to those applicable to more traditional financial institutions. Also note that, unlike the SFC Type 1 and Type 7 License, the VASP License is not an opt in licencing regime.

Under the Amended AMLO, "VA" generally captures a cryptographically secured digital representation value that (a) is expressed as a unit of account or a store of economic value; (b) either (i) is used (or is intended to be used) as a medium of exchange accepted by the public as payment for goods or services, or for the discharge of debt, or for investment purposes; or (ii) provides rights, eligibility or access to vote on the management, administration or governance of the affairs in connection with any cryptographically secured digital representation of value; (c) can be transferred, stored or traded electronically; and (d) satisfies other characteristics prescribed by the SFC.

Notably, the SFC clarified that while the definition does not explicitly cover non fungible tokens (NFTs), depending on the terms and features of the specific NFT, such NFT may be caught by the definition of VA. It should also be noted that VAs, whether or not they are Securities, will be caught under this licencing regime.

VASPs will initially be restricted to offering VA exchange services to Professional Investors, meaning that VA exchanges will be prohibited from dealing with retail customers. However, in light of feedback received from LegCo members and the public, and following soft consultations with the industry and stakeholders, the SFC will be launching a public consultation on whether retail investors should be able to access SFC licensed trading platforms. This will include proposals on governance procedures and listing criteria to admit tokens for secondary market trading by retail investors.

An applicant wishing to be licensed as a VASP must demonstrate to the SFC that:

- it is a fit and proper person to be licensed to provide the VA service;
- it has at least two persons fit and proper to be responsible officers (ROs), each of whom are of sufficient authority within the applicant and at least one of whom must be an executive director;
- each director of the applicant is fit and proper; and
- the ultimate beneficial owner of the applicant is fit and proper to be the ultimate beneficial owner of a VASP licensee.

These requirements are similar to the existing requirements for the SFC's licencing of regulated activities under the SFO.

VASPs will be required to comply with existing requirements under the AMLO on customer due diligence and record keeping requirements, which will be on par with those applicable to traditional financial institutions.

While there is no detailed guidance on the criteria and requirements in relation to VASPs published by the Hong Kong government nor the SFC at the moment, it can be anticipated that these will be similar to those applicable to existing Type 1 and Type 7 License.

While the Amended AMLO will take effect in April 2023, the VASP licencing regime will commence in June 2023, with a 12 month transitional period for any corporation that has been carrying on a VASP business before 1 June 2023. Existing VASPs that file an application to the SFC by the application deadline of 1 March 2023 will be deemed to be a licensed VASP from the day after the expiry of 12 months from the

transitional period (that is, 2 June 2024), until the SFC has made a decision to either approve or reject their license application, or the license applicant withdraws their application.

3. Virtual Asset Fund Management

In Hong Kong, if an asset manager with a Type 9 License intends to manage funds (or portions of funds) that invest in VAs which have (a) a stated investment objective to invest in VAs; or (b) an intention to invest 10% or more of the gross asset value of their portfolio in VAs, it will be required to apply to the SFC to "upgrade" the Type 9 License.

"VA" under this regime is defined as digital representations of value, which may be in the form of: digital tokens (eg. digital currencies, utility tokens or asset backed tokens); any other virtual commodities; and crypto assets or other assets of essentially the same nature, irrespective of whether they may be deemed "securities" or "futures contracts" as defined in the SFO. As of the date of this brief, we understand that there are fewer than 10 SFC licensed fund managers which have successfully "upgraded" their Type 9 Licenses (VA Fund Managers).

As part of the application to "upgrade" its Type 9 License, a Type 9 License manager would be asked by the SFC to agree and enter into the "Proforma Terms and Conditions for Licensed Corporations, Which Manage Portfolios that Invest in Virtual Assets" issued by the SFC (VA Fund Manager T&Cs). The VA Fund Manager T&Cs set forth terms and conditions that are imposed on all in scope VA fund managers in the form of licencing conditions, subject to minor variations and elaborations concerning certain business models. The VA Fund Manager T&Cs are substantially similar to the SFC's Fund Managers Code of Conduct, with adaptations to the nature of VAs and business operations applicable to fund managers that manage VAs.

If a Type 9 License Manager manages funds (or portions of funds) that invests in "virtual assets" which do not meet either criteria, it would not be required to "upgrade" its license (De Minimis Exemption), but would nevertheless be required to notify the SFC.

VA Fund Managers responsible, or to which responsibility has been delegated, for the overall operation of a fund are subject to certain of the VA Fund Manager T&Cs. A table summarising the key responsibilities of VA Fund Managers under the VA Fund Manager T&Cs is available in section 1 of Appendix B.

VA Fund Managers that (i) conduct discretionary account management (in the form of an investment mandate or a predefined model investment portfolio) and (ii) receive management fees and/or performance fees as remuneration for managing the discretionary accounts of their clients (VA Discretionary Account Managers) are subject to additional requirements in Appendix 1 of the VA Fund Manager T&Cs. We have set out the additional requirements applicable to Virtual Asset Discretionary Account Managers (including the minimum content requirements of discretionary client agreements and its responsibilities) under section 2 of <u>Appendix B</u>.

Contravention of the VA Fund Manager T&Cs' licencing conditions is likely to reflect adversely on the fitness and propriety of a VA Fund Manager or VA Discretionary Account Manager to remain licensed, and may result in disciplinary action by the SFC. The SFC will adopt a pragmatic approach in implementing the VA Fund Manager T&Cs, taking into account all relevant circumstances, including the size of the VA Fund Manager or VA Discretionary Account Manager, as the case may be, as well as any compensatory measures implemented by their senior management.

4. Distribution of Virtual Asset Related Product

On 28 January 2022, the SFC and the Hong Kong Monetary Authority (HKMA) issued a joint circular (SFC HKMA Joint Circular) ⁵ to SFC regulated intermediaries (SFC Intermediaries) on their regulatory expectations for VA related activities, including the distribution of VA related products (VA related Products), provision of VA dealing services and provision of VA advisory services.

In relation to distribution of VA related Products, we have set out below some key takeaways from the SFC HKMA Joint Circular:

- Some VA related Products are likely to be considered as "complex products" for the purposes of the SFC's Code of Conduct and should therefore comply with the SFC's requirements which governs the sale of complex products;
- VA related Products can only be offered to Professional Investors;
- SFC Intermediaries should observe suitability obligations whether or not there has been solicitation or recommendation;
- Where the VA related Product is a derivative product, SFC Intermediaries should ensure compliance with requirements for derivative products.
- SFC Intermediaries should conduct proper product due diligence;
- SFC Intermediaries should ensure that the client understands the nature and risks of VA related Products, and provide them with warning statements specific to virtual asset.
- Non institutional professional investors should take a VA Knowledge Test (using the non exhaustive criteria set out under Appendix 1 of the SFC HKMA Joint Circular). If a client does not pass the VA Knowledge Test, the Intermediary may only proceed it would be acting in the client's best interests and it has provided training to the client on the nature and risks of VAs.

Please refer to <u>Appendix C</u> for a summary table on the key requirements in relation to distribution of VA-related Products (including VA funds).

5. Virtual Asset Dealing

The second regulatory regime set out under in SFC HKMA Joint Circular relates to the provision of VA dealing services (VA Dealing Services), and we have set out below some key takeaways:

- All regulatory requirements imposed by SFC/ HKMA should be complied with by a Type 1 (dealing
 in securities) Intermediary when providing VA Dealing Services, even if the VA concerned is not a
 security or future (which technically falls outside of SFC's jurisdiction).
- SFC Intermediaries can only partner with SFC licensed VA trading platforms (ie. Type 1 and Type 7 License VA Trading Platforms, and in the future, VASPs) for the provision of VA Dealing Services.
- SFC Intermediaries providing VA Dealing Services can only provide such services to Professional Investors.
- SFC Intermediaries can only provide VA Dealing Services with existing clients to which they provide services in Type 1 regulated activities.
- SFC Intermediaries should only permit clients to deposit or withdraw fiat currencies from their accounts, and should not allow the deposit or withdrawal of client VAs.

⁵ https://apps.sfc.hk/edistributionWeb/gateway/EN/circular/suitability/doc?refNo=22EC10

Please refer to Appendix D for a summary table on the key requirements in relation to VA Dealing Services.

6. Virtual Asset Advisory Services

The third regulatory regime set out under in SFC HKMA Joint Circular relates to the provision of VA advisory services (VA Advisory Services), and we have set out below some key takeaways:

- All regulatory requirements imposed by SFC/ HKMA should be complied with by a Type 4 (advising
 on securities) Intermediary when providing VA Advisory Services, even if the VA concerned is not
 a security or future (which technically falls outside of SFC's jurisdiction).
- SFC Intermediaries can only provide VA Advisory Services with existing clients to which they provide services in Type 1 or Type 4 regulated activities.
- SFC Intermediaries must comply with the licencing and registration terms and conditions for provision of VA Advisory Services

Please refer to <u>Appendix E</u> for a summary table on the key requirements in relation to VA Advisory Services.

7. HKMA Guidance on dealing with Virtual Asset Services Providers

In January 2022, the HKMA issued a regulatory guidance to set out guiding principles on what HKMA regulated authorised institutions (ie. banks) should pay attention to when dealing with matters relating to VAs and VA service providers (HKMA Guidance)⁶. The HKMA issued the HKMA Guidance to provide guidance as to its regulatory approaches regarding banks' interface with and provision of intermediary services to customers related to crypto assets. The HKMA notes that it adopts a risk based approach to supervising banks' VA related activities in line with applicable international standards and based on the principle of "same risk, same regulation".

Set out below are a few key takeaways from the HKMA Guidance:

- The HKMA considers that banks should undertake risk assessments to identify and understand the associated risks before engaging in any VA related activities.
- The HKMA also notes that banks should take appropriate measures to manage and mitigate the identified risks, taking into account applicable legal and regulatory requirements, locally and overseas.
- When supervising banks' VA related activities, the HKMA will focus on 3 areas:
 - Prudential Supervision: The HKMA does not currently intend to prohibit banks from incurring financial exposures to VAs, such as through investment in VAs, lending against VAs as collateral, or allowing their customers to use credit cards or other payment services to acquire VAs. This is on the premise that banks have put in place adequate risk management controls, with sufficient oversight by their senior management over such activities. Specifically, banks will be expected to conduct proper due diligence of the VAs to which they will incur exposures.
 - o AML/CFT and Financial Crime Risk: Banks should establish and implement effective AML/CFT policies, procedures and controls to manage and mitigate ML/TF risks taking

⁶ https://www.hkma.gov.hk/media/eng/doc/key-information/guidelines-and-circular/2022/20220128e3.pdf

into account any relevant guidance issued by the HKMA and the FATF, such as the FATF's "Guidance for a Risk Based Approach to Virtual Assets and Virtual Asset Service Providers", including:

- Banks should pay attention to customers engaging in VA related activities through their bank accounts (eg. frequent fund transfers to and from VA platforms), and should file suspicious transaction reports to the relevant authority where there are grounds for suspicion.
- If banks establish and maintain business relationships with VA service providers (eg. opening bank accounts), appropriate ML/TF risk assessments should be conducted in line with the risk based approach to differentiate the risks of individual VASPs. Banks may need to undertake additional customer due diligence measures similar to those for offering correspondent banking.
- Banks entering into business relationships with VASPs should also confirm with the VASP concerned that its operations do not breach any applicable laws and regulations in Hong Kong or other relevant jurisdictions.
- o *Investor Protection:* Banks should observe guidance issued by the HKMA and the SFC from time to time, in particular, the SFC HKMA Joint Circular.

FATF / GAFI updated its Rule 16 on June 21 2019 to require the originators and beneficiaries of all transfers of digital funds to exchange identifying information. The rule applies to all VASPs, financial institutions and obliged entities. Additionally, the originators and beneficiaries involved in a transfer must be able to guarantee the accuracy of the information they send to the other.

This requires a significant compliance obligation for VASPs. VASPs forcing a consideration of the costs and administrative effort solutions to comply and to find a way to keep cryptocurrency transactions efficient and cost effective for customers.

Bretteville Consulting

8. Virtual Asset Futures ETFs

Given the rapid development of the VA market and the increased availability of VA products to both professional and retail investors globally, the SFC has accepted applications for authorisation of VA futures exchange traded funds (VA Futures ETF) that will be available to retail investors upon authorisation.

In October 2022, the SFC published a circular on VA Futures ETF (ETF Circular), that sets out requirements for VA Futures ETF that are seeking SFC authorisation for public offering, in addition to the requirements set out in Chapters 7 and 8 of the SFC's Code on Unit Trust and Mutual Funds (UT Code). The main additional requirements in the ETF Circular include:

Eligible management company: The management company of the VA Futures ETF must have a
good track record of regulatory compliance, and a proven track record in managing ETFs of at
least three years. The relevant experiences in managing the same or similar type of products (ie.
VA related products) from the group of companies to which the management company belongs
will be taken into account. The SFC may consider, on a case by case basis, whether they will accept
a delegation or co-management arrangement.

- Eligible futures: The VA Futures ETF must only invest in futures contracts that are listed and traded on conventional regulated exchanges, currently confined to Bitcoin futures and Ether futures traded on the Chicago Mercantile Exchange. The SFC may further expand the scope of eligible futures in the future upon further review.
- Investment strategy: The VA Futures ETF must adopt an active strategy that allows flexibility in portfolio management and describes its strategy in the event of rolling of futures contracts and market disruptions. The net derivative exposure (as in defined in the UT Code) must not exceed 100% of the VA Futures ETF's total net asset value.

There have been 3 VA Futures ETFs which have been approved by the SFC and launched since the introduction of this new regime.

9. Securities Tokens Offering

A securities token is a financial instrument which represents the ownership interest in an asset on a blockchain.

In the Fintech Week Keynote, Leung commented that security token offerings (STOs) have been gaining traction amongst traditional financial institutions, including the tokenisation of traditional financial instruments, such as debt securities and units in collective investment schemes. Leung stated that the SFC will be issuing a circular setting out the requirements applicable to STOs and the listing of STOs, which will largely mirror the existing SFC regime for traditional securities offerings.

Leung also noted that, where the security token is a digital representation of a traditional security but is issued or traded on a blockchain, the security token will be treated the same way as the existing underlying traditional security in terms of regulatory status. This means that the security token will no longer be a "complex product" solely because it is issued or traded on blockchain. If, however, the tokenisation process leads to additional features that make the security token "complex", then such security token will be regarded as a "complex product", and distribution will be restricted to professional investors only.

In addition, the SFC expects distributors who distribute security tokens to perform reasonable due diligence and conduct smart contract audits before the security tokens are distributed. These new regulations, together with the modified requirements for listing security tokens on licensed VA exchanges, will be addressed in an upcoming SFC circular.

It is however important to note that while the issuance of STOs will no longer be subject to more stringent requirements than traditional securities, their issuance, distribution, management and any other related activities will nevertheless be subject to existing legal and regulatory requirements applicable to traditional securities. This means, for example, STO distribution would likely trigger the requirement to have a Type 1 (dealing in securities) license from the SFC.

10. Stablecoins

After issuing a discussion paper in January 2022 and receiving over 50 responses from the public, the HKMA issued its "Conclusion on Discussion Paper on Cryptoassets and Stablecoins" in January 2023 (Stablecoin Consultation Conclusions), which proposes the introduction of a new stablecoin licencing regime (Stablecoin License).

While acknowledging the interconnectedness between other types of crypto-assets and the mainstream financial system, the HKMA at this stage will prioritise the development of a regulatory framework for "payment related stablecoins". This will focus on the proposed Stablecoin License regime as set out under the Stablecoin Consultation Conclusions.

Scope of Stablecoins

At this stage, the HKMA intends to regulate stablecoins that purport to reference one or more fiat currencies, regardless of whether the coins are backed by assets, or reference fiat currencies through algorithms or arbitrage mechanisms (In Scope Stablecoin).

However, interestingly, the HKMA notes that algorithmic stablecoins will unlikely meet the regulatory requirements under the Stablecoin License regime (see the section "Key Features of the Proposed Stablecoin License - Key Regulatory Principles" below). It appears that while these stablecoins will be in scope for regulation, the service providers of these coins will be unlikely to be granted a license under the current regime. This may mean that these service providers of these stablecoins may not conduct the proposed regulated activities in Hong Kong.

That said, flexibility will be built in to enable the HKMA to scope in other stablecoin structures for regulation under the proposed regime in the future.

Key Features of the Proposed Stablecoin License

While the HKMA is still formulating the details of the Stablecoin License regime, we have set out below the key features of the proposed Stablecoin License regime:

Key Activities to be	
Regulated	

The HKMA proposes that there will be a different type of license for each different type of In Scope Stablecoin regulated activities.

The HKMA proposes to regulate the following key activities related to an In Scope stablecoin, including:

- (a) **Governance:** establishment and maintenance of the rules governing an In Scope Stablecoin arrangement;
- (b) **Issuance:** issuing, creation or destroying of an In Scope Stablecoin;
- (c) Stabilisation: stablisation and reserve management arrangements of an In Scope Stablecoin (whether or not such arrangements of an In Scope Stablecoin are provided by the issuer); and
- (d) **Wallets:** provision of services that allow the storage of the users' cryptographic keys which enable access to the users' holding if an In Scope Stablecoin and the management of In Scope Stablecoin

Flexibility will be built into the proposed regulatory regime to enable the HKMA to, having regard to matters of significant public interest, include new types of regulated activities in the future.

Entities that will require a Stablecoin License

Entities that are involved in the following activities in relation to an In Scope Stablecoin will require a license from the HKMA under the proposed Stablecoin License regime:

- (a) conducting a regulated activity in Hong Kong;
- (b) actively marketing a regulated activity to the public of Hong Kong;
- (c) conducting a regulated activity which concerns an In Scope Stablecoin that purports to reference to the value of the Hong Kong dollar; or
- (d) the authority is of the opinion that should be so regulated, having regard to matters of significant public interest.

Note that an entity that conducting a regulated activity which concerns an In Scope Stablecoin that purports to reference to the value of the Hong Kong dollar is required to obtain a Stablecoin License whether or not the relevant regulated activities is conducted in Hong Kong or actively marketed to the general public of Hong Kong. This is due to the HKMA's consideration that stablecoins referencing the Hong Kong dollar would have much higher likelihood of adoption and usage by the general public in Hong Kong, hence giving rise to higher monetary and financial stability concerns and the need for enhanced user protection.

Also, note that both Hong Kong authorised banks and non authorised banks are eligible to apply for a license to issue stablecoins, as long as they can satisfy the relevant licencing and regulatory requirements.

Key Regulatory Principles

The HKMA will continue to consult the market to formulate the exact and detailed regulatory requirements of the Stablecoin License, but has set out several principle regulatory elements for the regime:

- (a) Comprehensive regulatory framework: The regulatory requirements should cover a broad range of issues including ownership, governance and management, financial resources requirements, risk management, AML/CFT, user protection and regular audits and disclosure requirements.
- (b) Full backing and redemption at par: The value of the reserve assets of a stablecoin arrangement should meet the value of the outstanding stablecoins at all times. The reserve assets should be of high quality and high liquidity. Stablecoins that derive their value based on arbitrage or algorithm will not be accepted. Stablecoin holders should be able to redeem the stablecoins into the referenced fiat currency at par within a reasonable period.
- (c) Principal business restriction: The regulated entities should not conduct activities that deviate from its principal business as permitted under their relevant license. For example, wallet operators should not engage in lending activities.

The HKMA acknowledges that there are mixed responses as to whether the Stablecoin License regime should impose a local incorporation requirement. The HKMA is of the view that imposing a local incorporation requirement is helpful to enable the HKMA to effectively supervise the licensed entities and enforce the regulatory requirements. The HKMA is in the process of evaluating different options, such as whether certain mitigation measures could be adopted in lieu of the local incorporation requirement while upholding the necessary level of robustness and effectiveness of the regulatory regime.

The HKMA has not finalised how exactly it will implement the Stablecoin License regime. It noted that the amendment of PSSVFO may serve the purpose of bringing stablecoins into the regulatory remit from the payment perspective, but there may also be merits in introducing a new stand-alone legislation that starts with the regulation of stablecoins while may bring other segments of the crypto-asset market under regulation in the future.

Having considered the volatility and risks of stablecoins, as well as the need to adopt the latest international recommendations and align Hong Kong's regulatory regime in stablecoins with those in other major jurisdictions, the HKMA will work towards putting in place the regulatory regime by 2023/24.

The proposed timeline will also allow the HKMA to conduct further assessment and work with the HKSAR government, local financial regulators and other relevant stakeholders when formulating the details of the regime, in order to avoid regulatory arbitrage, identify and address regulatory overlaps or gaps and mitigate the risks arising from different activities (in particular the existing crypto related regulatory framework, including the upcoming virtual asset service provider licencing regime under the recently effective amended Anti Money Laundering and Counter Terrorist Financing Ordinance).

11. Conclusion and Future Outlook

Looking at the developments of the Hong Kong laws and regulations in VAs, it is safe to say that that the Hong Kong government has lived up to its pledge to open up the virtual asset industry to provide Hong Kong with a competitive edge as a virtual asset hub in the Asia region. Hong Kong has developed a wide array of licencing and regulatory regimes which allow VA industry players to navigate the market with confidence.

Apart from the VASP License, retail STOs and Stablecoin License which will come into force in the coming months, it can be anticipated that the Hong Kong government will continue to work with the city's regulators to develop more useful legal and regulatory guidance for the industry which will help foster the crypto landscape.

It is understood that the regulators are actively working on a number of other VA related initiatives, including VA derivatives and DeFi, although these efforts are quite preliminary at this stage. The government is also energetically developing its Web3.0 capabilities and talent attraction strategies. The HKMA also confirmed that the next green bond that it will issue will be tokenised. The global VA industry at large should continue to monitor this space and seize opportunities in this evolving crypto hub.

The crypto derivatives market has experienced a remarkable increase in its trading activity, surpassing the spot market in January 2022 and continuing to expand at a substantial rate. Despite the magnitude of this growth, the crypto derivatives market remains largely unregulated, with

countries such as Hong Kong and Singapore still lacking clear licencing guidelines and regulations. This situation presents significant concerns regarding market stability and investor protection. In order to ensure the longevity and sustainability of the crypto derivatives market, it is imperative that regulatory bodies establish clear and comprehensive regulations to safeguard participants and promote transparency and integrity. The size and significance of the market only serve to underscore the importance of having well defined rules and regulations in place.

Gravity Group

FSRG BRIEFS - VIRTUAL ASSETS

Hong Kong - Virtual Asset Fund Management

1. Virtual Asset Fund Management Regulations

In October 2019, the SFC issued "Proforma Terms and Conditions for Licensed Corporations, Which Manage Portfolios that Invest in Virtual Assets" (VA Fund Manager T&Cs). The VA Fund Manager T&Cs set out terms and conditions that are imposed on all in scope virtual asset (VA) fund managers (VA Fund Managers) in the form of licencing conditions, subject to minor variations and elaborations concerning certain business models.

The VA Fund Manager T&Cs are substantially similar to the SFC's Fund Managers Code of Conduct, with adaptations to the nature of VAs and business operations applicable to fund managers that manage VAs. Please refer to the brief titled "Hong Kong Virtual Asset Laws and Regulations Overview" for further details of the VA Fund Manager T&Cs.

As of the date of this brief, the SFC has approved applications from ten asset managers to manage funds with 10% or more of the gross asset value of their portfolio in VAs (Upgrade Application). In this brief, we have set out some high level guidelines on the Upgrade Application from our experience with working with four of these VA Fund Managers.

2. Upgrade Application Process

Type 9 (asset manager) license applicants and existing Type 9 licensed corporations are required to inform the SFC if they plan to manage one or more portfolios that invest in VAs, subject to the De Minimis Exemption (ie. investing less than 10 percent of the gross asset value of their portfolio in VAs).

Upon being so informed, the SFC will first seek to understand the firm's business activities. If the firm appears to be capable of meeting the expected regulatory standards, the proposed VA Fund Manager T&Cs will be provided to the firm (where applicable) and the SFC will discuss them with the firm and vary them in light of its particular business model so as to ensure that they are reasonable and appropriate.

In practice, an applicant will be required to complete a comprehensive questionnaire, which covers, among others, the considerations set out below. There will likely be several rounds of requisitions from the SFC on the responses in the questionnaire, often resulting with a call or meeting with the regulator. Successful applicants will then be required to agree and comply with the VA Fund Manager T&Cs, which will be imposed as a licencing condition.

Generally, from our experience and understanding of the market, this process will take any time from six months to over a year, depending on various factors including the applicant's responsiveness, the complexity of the application and the proposed key terms of the funds, the ability to demonstrate the applicant's willingness and capability to comply with the VA Fund Manager T&Cs.

3. Considerations

We have set out below some key considerations when an applicant proceeds with the Upgrade Application, in addition to those set out in the VA Fund Manager T&Cs:

- Management Experience: Generally, similar to a traditional SFC license application, one or more
 key personnel (ideally the existing or the proposed responsible officer of the T9 licensed
 corporation) should have 3 or more years of experience in the relevant regulated activity, in this
 case, managing VA and VA funds (either in a not regulated or proprietary environment). It will be
 difficult to demonstrate the applicant's ability to properly managing VA funds in a regulated
 context without such experience.
- Trading Platforms: It is generally expected that all the counterparties of the VA fund and the VA
 Fund Manager, including the trading platform used by the VA fund for trading of VAs, should be
 appropriately regulated by an internationally recognised regulator in the relevant jurisdiction. It
 would be difficult to demonstrate the applicant's propriety to manage VA funds in a regulated
 environment if it proposes to use an unregulated trading platform.
- Custodian: Similar to the requirements for trading platforms, a custodian of the VAs of a VA Fund should be appropriately regulated by an internationally recognised regulator in the relevant jurisdiction. The applicant should also demonstrate that the proposed custodian has appropriate cybersecurity and financial ability to safeguard the VAs of the VA fund.
- Fund Administrator: A fund administrators to be appointed by VA funds should have sufficient experience, capability and expertise in dealing with similar VA funds. In particular, it should have capability in dealing with valuation of VAs. Engaging an experienced fund administrator prior to the launch of the fund would help making the launch much smoother, as it is able to provide practical advice in relation to the launch and the terms of the fund.
- Auditor: Similar to fund administrators, auditors to be appointed by VA funds should have sufficient experience, capability and expertise in dealing with similar VA funds.
- Cybersecurity: Generally, the cybersecurity arrangement of the applicant should be upgraded so
 that it closes any gaps between the existing arrangement and the terms in the VA Fund Manager
 T&Cs. An IT consultant would be helpful in identifying and closing any such gaps to ensure
 compliance, as well as ensuring that the VA Fund Manager is less susceptible to vulnerabilities
 and hacking.
- Types of Assets: At present, the VA fund terms that have been vetted by the SFC (as part of the Upgrade Application) have only allowed investments into coins, on a long basis, with high liquidity and market capitalisation, and therefore the investment universe is limited. It has been understood by the market that there are VA funds who can also enter into certain derivative instruments with traditional financial instruments for leveraged transactions, hedging and shorting. It remains to be seen whether the SFC is ready to accept applications which proposes to invest in other types of instruments and with more "crypto native" features, such as ICOs, VC type funds, derivatives with DeFi exchanges, staking, NFTs, redemption/ subscription in kind etc.
- Risk Management: The applicant should put in place risk management policies, process and procedures that are commensurate with the types of VA funds an applicant proposes to manage.
 For example, the risk management approach for an actively managed fund would be different from that of a passively managed index tracking fund.

4. Non SFC Licensed Managers – Offshore Options?

Some managers may consider the VA Fund Manager T&Cs to be restrictive, but the SFC can be commended for its cautious approach amidst the recent problems with certain crypto fund managers regulated in other jurisdictions.

While Hong Kong remains a popular option for setting up VA Fund Managers, some managers will opt for other jurisdictions with more flexible regulatory requirements that provide them with the ability of creating a broader range and more innovative fund products, including certain offshore jurisdictions such as Cayman Islands, British Virgin Islands, Gibraltar, Seychelles and Malta.

We note that while these jurisdictions may be considered to have lower regulatory and compliance thresholds, care must be taken when structuring fund and manager entities in these jurisdictions as many of these jurisdictions have already implemented, or in the process of looking into implementing, crypto related regulations which may affect manager's businesses. Managers must also observe the local laws and regulations when marketing their VA funds, as traditional securities and funds marketing laws and regulations will still be applicable for such activities, even if the act of managing VA funds is compliant in the jurisdiction where the fund manager is established.

FSRG BRIEFS - VIRTUAL ASSETS

Virtual Asset Funds – Trends and Opportunities

1. Overview

According to the AIMA Annual Global Crypto Hedge Fund Report 2022, one in three traditional hedge funds globally are currently investing in virtual assets, with average allocation around 4 percent. One third of global hedge fund managers not yet investing in virtual assets are also looking into invest or are in the late stages of planning to invest.

We are seeing similar trends in Asia Pacific, with more and more traditional hedge funds looking into virtual assets as a legitimate alternative asset for investments. Despite market weakness, according to a report from SigTech, 32 percent of hedge fund managers think that virtual assets will still offer the largest alpha generating opportunity over the next 3 years.

Hedge funds also favour virtual assets for "the underdevelopment of their underlying market mechanisms, such as the centralised and decentralised exchange models", and compared to stocks in more developed markets (eg. S&P500 index), mispricings are much easier to find in crypto space.

Other than hedge funds and open ended funds, venture capital funds (VCs) and other institutional investors are increasingly eyeing cryptocurrency businesses to see if there's a profit to be made in financing them. According to a report by Blockworks, 415 crypto and blockchain VC funds were launched in the first half of 2022, with a collective US\$121 billion raised, although only US\$32 billion has been deployed.

While there has been a decline in the number of launches compared to 2021 (when 999 crypto and blockchain VC funds were launched), VC fundraising in crypto and blockchain has outpaced 2021 levels by more than 40% and stills stands out compared to other high growth areas such as AI, life sciences, agritech and foodtech.

With the addition of funds available for retail investors, such as mutual funds and virtual asset and virtual asset futures ETFs, there are ever more opportunities for investors as well as fund managers. In this brief, we will explore the recent trends and opportunities for virtual asset fund managers.

2. Investment Instruments and Asset Classes

According to CoinMarketCap, as of the end of 2022, there were approximately 21,910 cryptocurrencies, with a total market capitalisation of US\$850 billion. There are also a wide variety of investment instruments and asset classes available for fund managers who seek exposure into virtual assets. We can broadly categorise virtual assets into ten different categories:

- Store of value (eg. BTC, LTC)
- Decentralised Finance (DeFi) (eg. Uni, Aave, Sushi)
- Infrastructure (eg. ETH, SOL, MATIC, LINK)
- Exchanges (eg. BNB, FTT)
- Entertainment, including NFTs, gaming, metaverse (eg. MANA, SAND)
- Data and Cloud (eg. Filecoin)

- Banking (eg. Ripple)
- Privacy and Security (eg. Monero)
- Enterprise (eg. Axoni)
- Healthcare
- Market Neutral, including stablecoins

AIMA Annual Global Crypto Hedge Fund Report 2022 reports that a majority of hedge funds have invested into store of value based cryptocurrencies, with Bitcoin (with the largest market capitalisation) being one of the main cryptocurrencies being invested. DeFi tokens, however, have rapidly increased in prominence, due to the increasing popularity of the usage of DeFi platforms, as opposed to centralised virtual asset exchanges and platforms.

Other than investing directly in virtual assets, some fund managers, including endowment funds and sovereign funds, can choose a more traditional (and potentially safer, from a custody point of view) method of obtaining exposure to the economic gains of virtual assets. This includes entering into on exchange and over the counter (OTC) derivative transactions with traditional financial institutions, including in particular Bitcoin and Ether futures and options contracts with the Chicago Mercantile Exchange (one of the earliest traditional exchanges entering into the virtual asset market).

While the breadth of products available is much more limited, this provides managers with some comfort from a custody and counterparty risk point of view as these arrangements are contractual and that they are dealing with traditional exchanges and securities houses in a more conventional manner. While entrance of these contractual arrangements incurs more transactional fees, managers can also avoid issues such as self custody and maintaining of crypto wallets, as one of the highest risks of holding virtual assets is hacking risks. These instruments also provide opportunities for managers to short certain virtual assets and enter into leveraged transactions with virtual asset underlying.

Another option for the more wary managers is to invest in other crypto funds already launched, whether private funds (hedge or VC style) or ETFs. Investing in other funds with crypto exposure, while incurring higher costs (including management fees, performance fees and other fund expenses of the underlying funds), reduces the manager's concern regarding custody and counterparty risks, as they are dealing with more traditional financial institutions with prudential oversight by securities regulators. Managers may also avoid directly dealing with virtual asset transactions with which they may not be familiar, including negotiating with crypto issuers on ICO deals and token holders on an OTC basis. Further, fund managers may utilise these fund vehicles to diversify their risks from an asset concentration perspective, which proves to be a helpful strategy given the current dangers (perceived or actual) of the sudden downfall of certain virtual assets.

3. DeFi Products

DeFi refers to decentralised finance or peer to peer finance. This provides a wide array of financial instruments without relying on intermediaries such as brokerages, exchanges or banks, by using smart contracts on a blockchain. As such, DeFi challenges the current centralised banking system.

DeFi has gained traction in the last year due to the industry's distrust of centralised exchanges and platforms. DeFi has also grown in popularity due to the availability of a wide array of products available, including, among others, staking, yield farming/ liquidity mining, borrowing and lending, derivative products, leveraged products, insurance, fund like products and aggregators. There are unlimited

variations of DeFi products with different features, structures and combinations which can provide managers and investors with products which are unimaginable in a traditional financial market.

We have set out below high level descriptions of some of the more prominent DeFi product types available in the market:

- Borrowing and Lending: These products algorithmically connect borrowers with lenders of virtual
 assets. Users take profit from interest for lending out their money. Some products set the interest
 rates algorithmically, so if there is a higher demand to borrow a cryptocurrency, the interest rates
 will be pushed higher. DeFi lending is collateral based, meaning in order to take out a loan, a user
 needs to put up collateral.
- Staking: The purest form of staking involves locking a set amount of crypto assets to become a
 validator in a Proof of Stake (PoS) blockchain network. Proof of work (PoW) relies on algorithms
 where transaction validation requires computation work whereas PoS relies on validators for
 validating the payment. Validators are eligible to receive staking rewards for creating and
 validating blocks.
- Yield Farming: This means moving multiple crypto assets over DeFi staking platforms to obtain
 maximum profit. Users make their assets available on a lending protocol or a liquidity pool and
 they earn yield in the form of interest (which can be in different form of tokens) and also a portion
 of the revenue generated by their DeFi staking platform of choice.
- Liquidity Mining: Liquidity mining is a subcategory of yield farming that involves depositing crypto assets and tokens to liquidity pools. A typical liquidity pool consists of two assets that make up a particular trading pair. As a liquidity miner (or provider), an investor could opt to deposit either asset into the pool. By depositing their assets into the Defi platforms, liquidity providers make it easier for traders to get into and out of positions, rewarded in the form of other tokens making up that particular trading pair.
- Fund like products: Similar to traditional fund management, but the underlying investment is
 composed of tokens, digital assets capturing traditional exposure, synthetic structured tokens or
 interest bearing accounts. DeFi asset management protocols combine them through smart
 contracts into pools, which function as a diversified portfolio of digital assets. Depending on the
 codes and algorithms underlying the product, these fund like products automatically rebalance
 with a predefined logic when certain conditions are met, similar to roboadvisors in traditional
 finance.
- Insurance like products: DeFi insurance like products are similar to traditional insurance, but focused on DeFi specific risks posed by smart contract failures, hacks of DeFi protocols, game theoretic risks of incentive systems and similar risks. Often, these products involve the charging of premium by the insurance provider that would collect such funds into an insurance pools, and would pay out to users if there are DeFi related failures specified under the terms of the DeFi insurance products. Some platforms (both centralised and decentralised platforms) have incorporated such arrangements within their platforms for other products available on those platforms.

Derivatives: DeFi derivative services connect buyers and sellers directly, backed by incentivised
collateral pools as with the other major DeFi categories. Some allow users to buy and sell synthetic
exposure to digital assets, without actually holding them. The derivatives can be associated with
leverage, magnifying gains and losses, or inversely connected with the asset price, providing the
equivalent of short exposure.

Every DeFi protocol and product has a different level of risks and different level of rewards. It is important to bear in mind that, often, the reason for a high reward from a DeFi product is because the corresponding risks are higher. Some of the key risks are as follows:

- Technology risk: if there is an issue with a DeFi protocol and product's code, there could
 potentially be weaknesses within a DeFi protocol, causing it to be subject to hacking and other
 cybersecurity risks.
- Asset risk: DeFi product typically uses other crypto assets owned as collateral if there is a downturn in the market generally or the price of the collateralised crypto assets, the crypto assets used as collateral may sharply decline in value, and some may see their positions liquidated.
- Product risk: less mature pools or newer protocols will have higher yields because they are untested. Also, there is no traditional insurance on investments when a manager or investor invests into DeFi products (although some DeFi products may provide insurance like products which provides an insurance pool in the case there are vulnerabilities in the underlying DeFi products).
- Regulatory risks: most, if not all, DeFi platforms and their products are unregulated by traditional
 financial regulators. Many of these DeFi platforms have little or no risk management, internal
 control or corporate governance and may potentially not comply with any laws and regulations in
 the jurisdictions where they are being offered, including securities laws (even though many
 products would likely trigger some form of securities laws), product laws, and even anti money
 laundering, counter terrorism financing and sanctions laws.

DeFi effectively removes the intermediary in several financial services, such as asset trading and lending. These services are instead executed by code deployed on blockchains which run on a blockchain or peer to peer (P2P) network of computers, as opposed to a central computer.

Existing AML/CTF regulatory frameworks rely on financial intermediaries to enforce the required controls; however, because of the absence of such intermediaries in the DeFi context, applying those same frameworks is not linear.

A DeFi as a coded application arrangement, even decentralised on a blockchain might not fall strictly into a VASP definition. However, the developers, owners and operators who exercise control or significant influence in the DeFi arrangements, albeit decentralised, may fall within a regulatory definition of a VASP where they are providing or facilitating VASP services. This is a FATF related caution.

Bretteville Consulting

4. Investment Universe – Metaverse, Web3.0 and NFTs

The investment universe for crypto funds has grown significantly in the past year. In particular, there has been a focus on Web3.0, the metaverse and NFTs, after Facebook rebranded to Meta and the swift development and adoption of virtual and augmented reality. The second half of 2022 saw metaverse and gaming projects attract significant investments: VCs were focused on play to earn projects and companies, paying special attention to blockchain casinos, collectibles, loot boxes and football themed games. In the fourth quarter, investors shifted their attention to augmented, virtual and mixed reality start ups.

While metaverse and Web3.0 work hand in hand, it is important to note that they are different concepts. Metaverse is defined as a collective virtual 3D shared space, created by the convergence of virtually enhanced physical and digital reality. A complete metaverse will be device independent, and will not be owned by a single vendor. It will have a virtual economy of itself, enabled by digital currencies and NFTs.

On the other hand, Web3.0 is a new stack of technologies built on blockchain protocols that support the development of decentralised web applications and enable users to control their own identity, content, and data. These technologies include privacy preserving protocols, decentralised governance, and decentralised application platforms. The metaverse will require many features that Web3.0 facilitates. For example, the metaverse can benefit from Web3's tokenisation to store and exchange value in a purely virtual context.

NFTs, a product of Web3.0, are unique, digital certificates that are stored on a blockchain and provide certain ownership rights in an asset, typically a digital one, such as a digital work of art. They are "non fungible' in the sense that each NFT is unique and hence, of different value which is a contrast to 'fungible' assets like the US dollar or Bitcoin, which are identical and interchangeable with one another.

There are many types of NFTs, including collectibles, arts, music, real estate (reality or virtual) etc. The "big dream" of NFTs is their interoperability with metaverse, where one uses NFTs to participate in the virtual reality and own things virtually, like one owns things in the real world. It allows holders of NFTs to pass on ownership of digital things to the next generation. We have seen many traditional financial institutions and investors jumping into the world of NFTs, including purchasing of virtual "real estate".

However, managers and investors should be wary of the potential pitfalls of NFTs, despite the hype and the "big dream" of owning things in the metaverse:

- Intellectual Property (IP) Rights: it is crucial to make sure the seller is the real owner of the IP rights of the underlying item of the NFT before purchasing an NFT. There have been cases of sellers fabricating fake NFTs, impersonating famous artists and mispresenting their authenticity. Even if the NFT is an authentic one, the purchase of the NFT may allow the buyer to own just the token, but not the underlying IP rights. An NFT owner is often given a personal license to use and display the art associated with the NFT, as well as a commercial license to make merchandise that displays that art associated with the NFT subject to a limit in gross revenue per year limit.
- Price Volatility: As with all investments, there are ups and downs to the prices of investment instruments. However, we note that in the first quarter of 2022, the volume of NFTs traded decreased 25% from the previous quarter and the volume of sales decreased by 20%. An NFT's value is completely determined by market demand and supply, with potentially no "value proposition", unlike traditional asset classes and even certain cryptocurrencies.

- Illiquidity: NFTs are highly illiquid and there is potential (and a big one) that no buyer is willing to
 purchase an NFT, let alone at a price which would give the seller a profit. Transaction data from
 OpenSea marketplace, a prominent NFT marketplace, indicates that only 28.5% of newly minted
 NFTs resell at a profit.
- Fraud: The largest problem for NFT buyers is the significant presence of fraud. For example, "wash trading" is when an NFT creator or seller inflates the price of his NFT by creating a false appearance of demand through selling and buying the NFT from multiple fake accounts with price increases through each transaction. In one case, the United States Attorney's Office of the Southern District of New York charged Nathanial Chastain, a former employee of the NFT marketplace OpenSea, with one count of wire fraud and one count of money laundering for allegedly using confidential business information to purchase and then later sell NFTs.

Another common form of fraud is "rug pulling", where an NFT seller announces a new NFT project that is supposed to come with future features (usually through a decentralised liquidity pool platform), then closes the project and takes off with the money once the first element of the supposed project is sold.

- Environmental Risks: One important ethical issue is the terrible environmental footprint of NFTs.
 Most Blockchains consume an immense amount of energy because they require numerous
 computers across the globe to support each transaction. While this is not entirely unique to NFTs,
 we note that some investors may have climate related or environmental, social and governance
 (ESG) requirements which may make a fund investing into NFT less attractive, even if it has a great
 return economically.
- Legal and Regulatory Risks: While most would not necessarily associate NFTs with securities, in
 fact, many NFTs comes with terms and conditions that would potentially move the token into the
 category of "securities" and therefore the scope of local securities regulators. Managers without
 appropriate licenses in the relevant jurisdiction may inadvertently fall into the jurisdiction of
 securities laws, thinking that they and their funds' investments fall outside of the realm of
 traditional securities laws and regulations.

NFT smart contract and hacker risk: The NFT market is currently dominated by the risk of smart contracts and NFT upkeep. Hackers can target a decentralised finance network in several different ways and steal cryptocurrency. There are several scenarios where hackers attack a DeFi network and steal a large amount of crypto. Recently, the most renowned DeFi protocol named Poly Network was attacked by hackers, and \$600 million was stolen. The hackers exploited the flaws of smart contracts to perform such a large scale attack on the Poly Network.

Bretteville Consulting

5. Strategies

For global crypto hedge funds, according to the AIMA Annual Global Crypto Hedge Fund Report 2022, those with most digital asset exposure are multi strategy funds. This is unsurprising and we are seeing also similar trends in Asia Pacific – managers in Asia who are likely to have exposure to digital assets are

multi strategy funds who are looking to get exposure to the upsides of the growing crypto market. Another popular type of crypto hedge fund is a market neutral fund, making up a third of all currently active crypto funds. There have also been more hedge funds taking a more quantitative approach, which takes advantage of market volatility and arbitrage opportunity, often using algorithmic techniques when investing.

For crypto and blockchain VC funds, we are seeing some of the most active investors more evenly distributing their investments across two or three different sectors, across DeFi, Web3.0, NFTs and infrastructure, with much less being invested in centralised finance platforms.

FSRG BRIEFS - VIRTUAL ASSETS

Hong Kong – Central Bank Digital Currencies

Central Bank Digital Currencies (CBDCs) can be defined as digital liabilities of a central bank that are widely available to the general public. Once introduced, CBDCs would be digital banknotes that could be used by individuals (retail function) or entities to settle transactions (wholesale function).

The Bank for International Settlement (BIS) defines "CBDCs" as 'a digital form of central bank money that is different from balances in traditional reserve or settlement accounts (eg. balances in accounts held by commercial banks at the central bank)'⁷. This definition encompasses experimental and innovative spaces for design, implementation and regulations on CBDCs.

DLT, Near Field Communications (NFC), QR codes and other digital innovations could contribute to versatile and mass scenario design of CBDCs and their wallets, entitling broader economic and social participation.

HKMA has been exploring other potentials, risks and regulatory implications of DLT since 2016⁸. This increased focus on DLT in the monetary system was reflected in the Hong Kong Fintech 2025 strategy announced in June 2021 for Future Proofing Hong Kong for Central Bank Digital Currencies: "The HKMA will strengthen its research work to increase Hong Kong's readiness in issuing CBDCs at both wholesale and retail levels". HKMA has already used DLT for trade finance in its eTradeConnect with Hong Kong Interbank Clearing Limited (HKICL) and the Institute of Digital Currency of the People's Bank of China (PBOC).

Responding to the opportunities offered by Distributed Ledger Technologies (DLT) and as part of its' "Fintech 2025" strategy, the Hong Kong Monetary Authority (HKMA) has been actively working with multiple stakeholders to identify use cases for CBDCs and assess the next steps for the possible introduction of e-HKD in Hong Kong.

Evolution of e-HKD

The first CBDC focused collaboration, named Project LionRock, was initiated in 2017 by HKMA, HKICL, three note issuing banks and R3, a DLT technology company, to evaluate the technical feasibility of CBDC issuance. It also included an interface to the Central Money Markets Unit (CMU) for delivery versus payment (DvP) of tokenised debt securities.

Edmond Lau, Senior Executive Director of HKMA, announced in 2020 that the prospect of issuing CBDC for retail payment purposes is limited given the efficient payment infrastructure and services available in Hong Kong.

Following this conclusion, an inter central banking collaboration, known as Project Inthanon-LionRock, was initiated between the HKMA and the Bank of Thailand. This studied the application of CBDCs to cross border payments, with a view of facilitating HK Dollar/Thai Baht Payment versus Payment (PvP) between banks in Hong Kong and Thailand. The cross border pain points are identified with public value and

⁷ BIS, Glossary and list of abbreviations pdf version. (2020). https://www.bis.org/publ/qtrpdf/r_qt2003c.pdf (accessed March 7, 2022).

⁸ HKMA, Whitepaper On Distributed Ledger Technology (2016).

desirability to issue wholesale and cross border CBDCs. Carried out in two phases, the Inthanon-LionRock project saw three participating central banks controlling the flow of their CBDCs and monitoring transactions and balances of their issued CBDCs with programmability in transaction privacy and aspects of automated compliance.

Building on the outcomes of Project Inthanon-LionRock and the work conducted by the BIS Innovation Lab, BIS, HKMA, the Institute of Digital Currency of the PBOC, the Central Bank of the UAE launched Project mBridge and invited twenty commercial banks to take part in cross border payment system testing. Project mBridge a common platform based on DLT upon which multiple central banks can issue and exchange their respective central bank digital currencies (multi CBDCs). Over US\$12 million was issued on the platform, facilitating over 160 payment and FX PvP transactions totalling more than US\$22 million in value.

Again evolving collaborative explorations of CBDCs, in June 2021, the HKMA commenced Project e-HKD, on the feasibility of retail e-HKD, named Aurum, aiming to address technical, legal and policy issues. To this end, the HKMA has published two consultation papers during the last 15 months, starting with a technical whitepaper in October 2021 and followed by a discussion paper titled "e-HKD: A policy and design perspective" in April 2022.

With retail and wholesale CBDCs being addressed, cross border CBDCs have now become a focal point globally, and are an important 19th building block of the Enhancing Cross Border Payments Roadmap drawn up by the Financial Stability Board (FSB), Committee on Payments and Market Infrastructures (CPMI) with BIS, IMF and World Bank⁹.

Meanwhile, ISO 20022 is promoted by its Registration Authority, Society for Worldwide Interbank Financial Telecommunications (SWIFT), to improve methods of sending cross border payments and reporting instructions towards the global payment standards in 2025¹⁰.

HKICL is also exploring initiatives around financial institutions and payment services, seeking to address concerns about lagging digital technologies underpinning the incumbent cross border payment systems.

Issuance of e-HKD

The HKMA has identified several potential benefits from the introduction of retail e-HKD that can be summarised in the following:

- 1. Improving the availability and usability of central bank money
- 2. Positioning for the challenges of new forms of money
- 3. Supporting innovation and meeting future payment needs in a digital economy
- 4. Improving the resilience and efficiency of the payment system
- 5. Reinforcing the transmission of monetary policy

At the same time, the 2022 policy discussion paper identified some possible challenges, as the introduction of retail e-HKD could have negative implications for bank funding and lead to higher cybersecurity and IT risks as well as higher operational risks due to power/network failures.

⁹ BFSB, Bahamas Financial Services Review. (2006).

¹⁰ The SWIFT Standards Team, ISO 20022 For Dummies®, SWIFT 5th Limited Edition. (2020) 67.

The HKMA has introduced and currently examines the following four potential distribution models for e-HKD:

- 1. The **direct (one tier) CBDC model**, according to which CBDC will be issued and distributed by the HKMA. According to the HKMA, the direct model would entail a significant operational burden for Central Banks, as well as cybersecurity and privacy risks.
- 2. The two tier hybrid model introduces a division of labour between the central bank and private sector intermediaries for the distribution of CBDC. The Central Bank would focus on providing the basic infrastructure of a CBDC and ensuring a level playing field for the private sector, serving as a backstop to the payment system. At the same time, the participating private sector intermediaries undertake the majority of the operational tasks and consumer facing activities. The private sector intermediaries would also process all retail payment transactions in real time, and the Central Bank would still record all retail balances.
- 3. The two tier intermediated model is similar to the hybrid model, with the only difference being that the Central Bank would not record any retail balance but only keep the wholesale balances of individual institutional intermediaries. According to the HKMA, the intermediated model entails a minimum operational requirement for the central bank and ensures higher cyber resilience through a higher degree of decoupling between the wholesale and the retail ledger.
- 4. CBDC backed e-money practically replicates the note issuing bank system of Hong Kong. It is also a two tier model, but it would be used for intermediaries' issuance of e-money that needs to be backed by CBDC. We need to note, however, that under this model, the CBDC backed e-money would be private money and not a direct liability of the central bank. Notably, the HKMA suggests that this model brings significant benefits of safety and customer protection, yet it flagged a risk as the oversight responsibility of central banks may be undermined by lacking information on backing assets, in case of insolvency of one or more issuing intermediaries.

Moreover, the issuance and redemption mechanism of e-HKD would have to comply with the currency board principles under Hong Kong's Linked Exchange Rate System (LERS), with the HKMA highlighting that any change in the monetary base would have to correspond to the same changes in foreign reserves. Hence, the HKMA noted that there are three possible issuance mechanisms for e-HKD:

- 1. Banks submitting US dollars in exchange for e-HKD (Coins approach)
- 2. Banks submitting US dollars in exchange for a Certificate of Indebtedness (Banknote approach)
- 3. Banks converting existing Aggregate Balance (AB) into e-HKD (AB approach)

Among the three options, the HKMA identified the AB approach as the least suitable as its indirect banking is relatively more complicated, which might undermine its credibility regarding the e-HKD backing by foreign reserves. Moreover, the AB approach could lead to increased volatility and interbank liquidity conditions¹¹.

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¹¹ HKMA, "e-HKD: A Policy and Design Perspective", (2022) 29-32.

Regulatory issues

A critical issue that has been widely covered by academic and industry literature, and has also been addressed by the HKMA, is the need to introduce a robust regulatory framework that would ensure compliance with Anti Money Laundering and Counter Terrorism Financing (AML/CFT) requirements while adhering to privacy requirements meeting people's respective expectations. The premise of regulations has three foundational principles reached by the Group of Seven (G7) and BIS: *Do no harm, Coexistence, Innovation and efficiency* ¹². That said, CBDCs regulation comes with broader financial stability considerations in order to ensure that introducing CBDCs would not compromise the system and increase financial risk.

Regulatory issues on CBDCs depend highly on prospective participants' compositions and the technologies underpinning them. For account based CBDC regulation, monitoring and supervision on the risk of loss, counterfeiting, privacy, money laundering etc. will be consistent, regardless of whether the digital funds transfers are retail or wholesale. Token based CBDC regulation is more complex as it has to incorporate multi jurisdictions in cross border scenarios. (There are precedents for central banking coordination in cross border banking regulation, as reflected, for example, in the Basel Capital Accords).

Charting the future of e-HKD

Looking forward, the HKMA has addressed several design features which can be of critical importance for the introduction of e-HKD:

- 1. Ensuring that e-HKD would be fully interoperable with other payment systems as such features would boost the efficiency of the payment system.
- 2. Introducing programmability features that would encourage innovation (eg. smart contracts), provided that the associated challenges (eg. programme glitches) would be addressed.
- 3. Deciding whether e-HKD should be remunerated or not.

The HKMA announced in September 2022 in a paper "'e-HKD Charting the Next Steps" that it would take a three step approach in preparing for any possible implementation of e-HKD that will include:

Conducting deep dive application research and pilot projects for possible use cases

The HKMA will encourage a wider group of stakeholders to present their interests and develop business models based on CBDCs. Already, during Hong Kong Fintech Week in 2022, Hong Kong's Global Fast Track CBDC competition winners were revealed: ARTA TechFin Corporation Limited (best technology), Bank of China (Hong Kong) (best use case), Giesecke+Devrient (best technology), Hang Seng Bank (best use case), HSBC (best ecosystem), Visa (best ecosystem). The HKMA will also seek to identify E-wallet app providers and continue development work on retail CBDCs.

In addition to publishing its own paper, "Regulations Prescribing The Framework For The Issuance And Use of e-HKD", the HKMA is also exploring innovative engagement and regulatory frameworks with

¹² BIS & G7, Central bank digital currencies: foundational principles and core features, Report no 1. (2020).

¹³ HKMA, e-HKD - Charting the Next Steps. (2022) 39.

several counterparts, such as Project Sela on cybersecurity with the Bank of Israel and the BIS Innovation Hub Hong Kong Centre.

Implementation of e-HKD

Finally, the cost of issuing and maintaining CBDCs will be further explored with input from the domestic market and by reference to international standards.

Though e-HKD is currently at a nascent stage, the international momentum around the development of CBDCs - with 114 countries currently exploring the technological and strategic opportunities - suggests that this will remain an important priority for the HKMA in the near future.

CBDCs are not insular monetary products, and they can grow with another culmination of investment, return and business model innovations. As observed in the issued and piloted CBDCs globally, the versatileness and viability of CBDCs business has created variations in service provisions and economic entities to address country specific problems, such as financial inclusion in the emerging market and payment efficiency in the developed economy. With state promotion of CBDCs, a cluster effect will mitigate the cost of communications in the digital space. Public private partnership may be a new formulation in understanding the governance of CBDCs.

Durham University

APPENDIX A

Key features under the Type 1 and Type 7 Regulatory Framework

Clients and Know Your Customer	 Serve Professional Investors only. Ensure that clients (other than institutional and certain qualified corporate investors) have sufficient knowledge of VAs. Accounts must be prefunded. No financial accommodation is permitted.
VAs for Trading	 SFC approval is needed for each VA included in the Type 1 and Type 7 License VA Trading Platform. Criteria for inclusion on the VA Trading Platform must be established. Due diligence must be conducted on all VAs. VAs that are Securities can be included only if they (i) are asset backed, (ii) are approved or qualified by, or registered with, regulators in comparable jurisdictions and (iii) have a track record that is at least 12 months post issuance. A legal opinion or memorandum is required for each VA that will be available in Hong Kong. Establish and enforce rules setting out obligations of and restrictions on VA issuers, and Platform trading rules.
Custody	 Client assets (VAs and client money) must be held on trust through an associated entity of the operator incorporated in Hong Kong that (i) holds a "trust or company service provider license"; (ii) is a wholly owned subsidiary of the operator; and (iii) does not conduct any business other than holding client assets of the Type 1 and Type 7 License VA Trading Platform. At least 98 percent of client VAs should be stored in cold wallets. No more than 2 percent of client VAs should be held in hot wallets. Client money should be held in segregated accounts of the Associated Entity that are maintained with an authorised financial institution in Hong Kong. Insurance coverage must be in effect at all times for risks associated with the custody of VAs that are held in hot storage (for which full coverage is required) and for cold storage (for which substantial coverage is required).
AML	 Adequate and appropriate anti money laundering/countering financing of terrorism policies, procedures and controls must be implemented.
Market Manipulation and Abuse Prevention	Implement and regularly review written policies and controls for the proper surveillance of activities on the Type 1 and Type 7 License VA

	 Trading Platform to identify, prevent and report any market manipulative or abusive trading activities. Adopt an effective market surveillance system provided by a reputable and independent provider.
Conflicts of Interest	 The operator should not engage in proprietary trading, including any market making activities on a proprietary basis. The operator and its associated entity should have a policy governing employees' dealings.
Investor Disclosure	 The operator must disclose certain prescribed risks in relation to VAs and the Type 1 and Type 7 License VA Trading Platform. The operator must provide contract notes, statements of accounts and receipts to clients (similar to a regular SFC licensed corporation).
Change in Business	The SFC's prior written approval is required for any plan or proposal (i) to introduce or offer a new or incidental service or activity or (ii) to make a material change to an existing service or activity of the Type 1 and Type 7 License VA Trading Platform.
Reporting	 The VA Trading Platform must provide certain reports to the SFC on its business activities in accordance with the prescribed format and timing. The VA Trading Platform must engage an independent professional firm acceptable to the SFC to conduct an annual review and confirm compliance with the Type 1 and Type 7 T&Cs and all relevant legal and regulatory requirements
Regulatory Requirements	The operator is required to observe existing regulatory requirements, such as (i) the SFC's Code of Conduct for Persons Licensed by or Registered With the SFC, (ii) Guidelines for the Regulation of Automated Trading Services and (iii) Guidelines on Online Distribution and Advisory Platforms.

APPENDIX B

VA Fund Manager T&Cs

Section 1 - Key Terms under the VA Fund Manager T&Cs

General Principles	Comply with general principles comparable to the SFC's Code of Conduct (in particular, the senior management of a VA Fund Manager will be primarily responsible for ensuring the maintenance of appropriate standards of conduct and adherence to procedures by such manager).
Organisation and Management Structure	 Maintain an effective organisation and management structure to: handle conflicts of interest; and ensure sufficient human and technical resources, risk management and compliance policies. Maintain a minimum liquid capital of the greater of: (a) HK\$ 3 million (US\$382,000) or (b) the variable required liquid capital (5% of adjusted liabilities as calculated in accordance with the Securities and Futures (Financial Resources) Rules). Appoint an independent compliance officer and draft detailed compliance procedures. Comply with requirements relating to segregation of duties and senior management responsibilities.
VA Fund Management	 Carry out investment transactions within each fund's mandate and execute fund orders on the best available terms. Only participate in underwriting activities on behalf of a fund if specifically permitted in the fund's mandate, and credit all commissions and fees received under such contract to the fund's account. When participating in an initial offering, ensure that the allocation received in the offering provides for a fair allocation among the funds that it manages and that preferential allocations are prohibited. Comply with requirements relating to: order allocation; connected person transactions; house accounts; disclosure of leverage; and liquidity management.
Custody	 Segregate fund assets from the manager's proprietary assets. Select and adopt the most appropriate custodial arrangement, taking into account the characteristics of different arrangements. Appoint independent custodians and take steps to ensure that the custodians are capable of performing their functions. Where self custody is adopted, ensure that: the reasons for adopting self custody are properly documented; appropriate safeguards are implemented; records are properly maintained; the licensed corporation's own assets can be effectively segregated from VAs in the event of insolvency of the licensed corporation; adequate insurance is

	maintained to cover the crypto assets; and proper disclosure is made to investors regarding the risks associated with such arrangements.
Operations	 Appoint an independent auditor to perform audits of financial statements, taking into account (among other matters) the auditor's experience and capability to check the existence and ownership, and ascertain the reasonableness of the valuation, of the relevant VAs. Exercise due care in selecting valuation principles, methodologies, models and policies, which are reasonably appropriate in the circumstances and in the best interests of the investors, and make proper disclosures to such investors. Comply with requirements relating to: recordkeeping; disclosure and management of side pockets; net asset value calculation; and pricing and reconciliations.
Dealing with the Fund and Fund Investors	 Provide investors with adequate information and updates regarding any material changes to enable them to make an informed decision about their investments (including the trading platforms and custodians used by the fund, as well as key risks associated with the fund's investment in VAs). Maintain proper procedures to ensure confidentiality of information and handling of complaints.
Marketing Activities	 Offer VA funds only to Professional Investors as defined under the SFO. Ensure representations made to investors and all marketing materials are accurate and not misleading.
Fees and Expenses	 Disclose the basis and amount of their fees and charges (which should be fair and reasonable). Receive soft dollars and cash rebates only under prescribed circumstances.
Reporting to the SFC	 Report to the SFC as soon as practicable upon any actual or suspected noncompliance with the VA Fund Manager T&Cs or any other applicable legal and regulatory requirements. Notify the SFC of any significant change in its business activities at least seven business days before the change takes place. Provide such other information as may be requested by the SFC promptly and in an open and cooperative manner. Ensure that all information provided to the SFC is accurate and not misleading.

Section 2 - Additional Requirements Applicable to Virtual Asset Discretionary Account Managers

VA Discretionary Account Managers are subject only to certain of the above VA Fund Manager T&Cs, as set out in Appendix 1 of the VA Fund Manager T&Cs. Appendix 1 also sets out the following additional requirements applicable to VA Discretionary Account Managers: (i) minimum content requirements of discretionary client agreements; and (ii) the responsibilities summarised below.

Target Clients	 Prior to providing discretionary account management to clients, assess whether they have: knowledge regarding investment in VAs; prior investment experience in private equity or venture capital; or provided capital for a start up business.
Suitability	 Conduct due diligence to ensure the mandate or predefined model investment portfolio is suitable for each client. Review the mandate or predefined model investment portfolio on a regular basis and recommend revisions where suitable for client's current circumstances. Document the relevant assessment and provide the assessment rationale to the client in writing.
Client Agreements	 Set out in discretionary client agreements the precise terms and conditions under which discretion will be exercised. Meet the minimum content requirement of discretionary client agreements, as set out in Appendix 1.
Performance Review and Valuation Reports	 Review the performance of discretionary accounts against agreed benchmarks at least twice a year, unless otherwise agreed with the client. Provide valuation reports to clients within 10 business days after the monthly accounting period, unless otherwise agreed with the client.

APPENDIX C

Key requirements related to the distribution of VA related Products (including VA funds)

Complex Products	VA related Products are likely to be considered "complex products" for the purposes of the SFC's Code of Conduct and should therefore comply with the SFC's requirements which governs the sale of complex products.
Selling Restrictions	VA related Products can only be offered to Professional Investors as defined under the SFO
Suitability Requirements	 SFC Intermediaries should observe suitability obligations whether or not there has been solicitation or recommendation. Where there has been solicitation or recommendation, it should ensure that such recommendations or solicitations made are suitable for clients in all circumstances, including assessing whether the nature and features of the VA related Product are suitable for the client and are in the best interests of the client, taking into account the client's risk tolerance, financial situation, etc.; and SFC Intermediaries should provide key features of the VA related Product and prominent warning statements to clients.
Due Diligence	 SFC Intermediaries should conduct proper due diligence on the products, which would include, understanding their risks and features, the targeted investors and the products' regulatory status. Additional due diligence requirements for unauthorised VA funds are set out in Appendix 4 of the SFC HKMA Joint Circular.
Derivative Products	Where the VA related Product is a derivative product, SFC Intermediaries should ensure compliance with requirements for derivative products (Derivative Product Requirements).
VA Knowledge Test	• For Professional Investors who are not (a) institutional Professional Investors (IPIs) or (b) qualified corporate Professional Investors (Qualified CPIs), SFC Intermediaries should assess whether clients have knowledge of investing in VAs or VA related Products prior to effecting a transaction in VA related products on their behalf, using the non exhaustive criteria set out under Appendix 1 of the SFC HKMA Joint Circular (VA Knowledge Test). If a client does not pass the VA Knowledge Test, the Intermediary may only proceed it would be acting in the client's best interests and it has provided training to the client on the nature and risks of VAs. SFC Intermediaries should also ensure that their clients have sufficient net worth to be able to assume the risks and bear the potential losses of trading VA related products.

Warning Statements	 SFC Intermediaries should ensure that the client understands the nature and risks of VA related Products, and provide them with warning statements (as a one off disclosure) specific to virtual asset, examples of which are set out in Appendix 5 of the SFC HKMA Joint Circular.
Financial Accommodation	SFC Intermediaries providing financial accommodation to a client should assure itself the client has the financial capacity to meet the obligations arising from leveraged or margin trading in VA related Products, including in a worst case scenario.
Clear and Comprehensible Information	SFC Intermediaries distributing VA related Products should provide information to clients in relation to VA related Products and the underlying VA investments in a clear and easily comprehensible manner.
VA Derivative Products and VA Derivative ETFs	• VA related derivative products traded on regulated exchanges specified by the SFC (VA Derivative Products) and exchange traded VA derivative funds authorised or approved for offering to retail investors by the respective regulator in a designated jurisdiction (VA Derivative ETFs) are not subject to the restriction that it can be provided to Professional Investors and can be provided to retail investors. However, such products would be considered complex exchanged traded derivatives; SFC Intermediaries may distribute them without the need to comply with the suitability requirement where there has been no solicitation or recommendation, but must comply with the Derivative Products Requirements and must conduct a VA Knowledge Test. For other exchange traded VA related derivative products, the would be considered "complex products" similar to other VA related Products.

APPENDIX D

Summary of the key requirements in relation to the provision of VA Dealing Services

Covering Non Security VAs	 All regulatory requirements imposed by SFC/ HKMA should be complied with by a Type 1 (dealing in securities) Intermediary when providing VA Dealing Services, even if the VA concerned is not a security or future (which technically falls outside of SFC's jurisdiction).
Trading with SFC Licensed Platforms Only	SFC Intermediaries can only partner with SFC licensed VA trading platforms (ie. Type 1 and Type 7 License VA Trading Platforms, and in the future, VASPs) for the provision of VA Dealing Services, whether by way of introducing clients to the platforms for direct trading or establishing an omnibus account with the platforms.
Professional Investors	SFC Intermediaries providing VA Dealing Services can only provide such services to Professional Investors.
Existing Clients	SFC Intermediaries can only provide VA Dealing Services with existing clients to which they provide services in Type 1 regulated activities.
Terms and Conditions	• Type 1 SFC Intermediaries must comply with the licencing and registration terms and conditions for provision of VA Dealing Services, as set out under Appendix 6 of the SFC HKMA Joint Circular (VA Dealing T&Cs). The terms under the VA Dealing T&Cs align with those set out under the Type 1 and Type 7 Regulatory Framework in relation to dealing functions, which imposes extensive requirements in relation to financial soundness, operations, prevention of market manipulation, dealing with clients, custody, client moneys, record keeping, audit, AML and counter financing of terrorism, conflicts of interest and ongoing reporting obligations.
No Deposit or Withdrawal of VAs	SFC Intermediaries should only permit clients to deposit or withdraw fiat currencies from their accounts, and should not allow the deposit or withdrawal of client VAs
Introducing Agent	Where SFC Intermediaries provide VA Dealing Services as an introducing agent, they should only introduce clients which are Professional Investors to SFC Licensed Platforms, and should not relay any orders on behalf of their clients to the platforms or hold any client assets.
VA Discretionary Account Management Services	 For VA discretionary account management services, SFC Intermediaries providing services which meet the de minimis threshold (ie. a stated investment objective of a portfolio to invest in VAs or an intention to invest 10% or more of the gross asset value of a portfolio in VAs) are subject to the additional requirements in VA Fund Manager T&Cs. Type 1 Intermediary authorised by its clients to provide VA Dealing Services

on a discretionary basis as an ancillary service should only invest less than 10% of the gross asset value of the client's portfolio in VAs. Registered institutions (ie. banks that conducts securities businesses and registered with the SFC) wishing to provide such services should inform the SFC and HKMA prior to such activities.

APPENDIX E

Summary of the key requirements in relation to provision of VA Advisory Services

Covering Non Security VAs	 All regulatory requirements imposed by SFC/ HKMA should be complied with by a Type 4 (advising on securities) Intermediary when providing VA Advisory Services, even if the VA concerned is not a security or future (which technically falls outside of SFC's jurisdiction).
Existing Clients	 SFC Intermediaries can only provide VA Advisory Services with existing clients to which they provide services in Type 1 or Type 4 regulated activities.
Terms and Conditions	 SFC Intermediaries must comply with the licencing and registration terms and conditions for provision of VA Advisory Services, as set out under Appendix 6 of the SFC HKMA Joint Circular (VA Advisory T&Cs), which provides that: Professional Investors: SFC Intermediaries providing VA Advisory Services can only provide such services to Professional Investors; Suitability: SFC Intermediaries should observe suitability requirements published by the SFC when providing VA Advisory Services. VA Knowledge Test: SFC Intermediaries should require the client (except for IPIs and Qualified CPIs) to pass the VA Knowledge Test before providing VA Advisory Services to the client; Written Client Agreement: SFC Intermediaries should enter into a written client agreement and include a prescribed provision as set out in the VA Advisory T&Cs.

GLOSSARY

AB	Aggregate Balance
AML/CFT	Anti Money Laundering/Counter Financing of Terrorism
Amended AMLO	Anti Money Laundering and Counter Terrorist Financing (Amendment) Bill 2022
AMLO	Anti Money Laundering and Counter Terrorist Financing Ordinance of Hong Kong
BIS	Bank for International Settlements
CBDC	Central Bank Digital Currencies
CMU	Central Money Markets Unit
СРМІ	Committee on Payments and Market Infrastructures
DeFi	Decentralised Finance
DLT	Distributed Ledger Technology
DvP	Delivery Versus Payment
ETF Circular	Circular issued by the SFC dated 31 October 2022 in relation to VA Futures ETF
FSB	Financial Stability Board
HKICL	Hong Kong Interbank Clearing Limited
НКМА	Hong Kong Monetary Authority
HKMA Guidance	Regulatory guidance issued by HKMA dated 28 January 2022
ICO	Initial Coin Offering
LERS	Linked Exchange Rate System
NFC	Near Field Communications
NFTs	Non Fungible Tokens
ОТС	Over The Counter
PoS	Proof of Stake

PoW	Proof of Work
PSSVFO	Payment Systems and Stored Value Facilities Ordinance of Hong Kong
Regulatory Framework	Opt In Regulatory Framework For SFC To License VA Trading Platforms Under VA Trading Platforms Under the Type 1 and Type 7 license Regime
RO	Responsible Officer of an SFC Licensed Corporation
SFC	Securities and Futures Commission of Hong Kong
SFC HKMA Joint Circular	Joint Circular Dated 28 January 2022 Issued Jointly by the SFC and HKMA
SFC Intermediaries	SFC Regulated Intermediaries
SFO	Securities and Futures Ordinance of Hong Kong
STO	Security Token Offering
SVF	Stored Value Facility Under the PSSVFO
SWIFT	Society for Worldwide Interbank Financial Telecommunications
Type 1 and Type 7 License	SFC Type 1 (Dealing in Securities) And 7 (Providing Automated Trading Services) License
Type 9 License	SFC Type 9 (Asset Management) License
UT Code	SFC's Code on Unit Trust and Mutual Funds
Upgrade Application	Upgrade Application for Type 9 Licensed Fund Managers to Become VA Fund Managers
VAs	Virtual Assets
VA Fund Managers	Type 9 Licensed Fund Manager Holding a License Upgraded to Manage Funds That Invest in VAs
VA Fund Manager T&Cs	"Proforma Terms and Conditions for Licensed Corporations, which Manage Portfolios that Invest in Virtual Assets" issued by the SFC
VA Futures ETF	Virtual Asset Futures Exchange Traded Fund
VA Trading Platform	Virtual Asset Trading Platform
VA Related Products	Virtual Asset Related Products (Including Virtual Asset Funds)

VASP	Virtual Asset Service Provider Licensed under the Amended AMLO
VASP License	VASP Licensing Regime Under the Amended AMLO

THANK YOU!

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