

Cryptocurrencies – Employee Benefits

Extract, IFRS® Discussion Group Report on the Meeting – October 16, 2018

The Group has discussed cryptocurrencies in various meetings:

- In [January 2018](#), the Group discussed the accounting for investments in decentralized digital currencies (also referred to as cryptocurrencies). Various discussions have taken place since then (e.g., see the IFRS Interpretations Committee [September 2018](#) meeting).
- In [June 2018](#), the Group discussed various accounting issues related to the mining or validation of a cryptocurrency.

At this meeting, the Group discussed the accounting for transactions whereby an entity receives services from both non-employees and employees in exchange for a type of cryptocurrency that carries a right to transfer to another party (e.g., Bitcoin, Ethereum, and Litecoin).

Fact Pattern 1

- Entity X holds Bitcoins, which have been accounted for using the cost model under IAS 38 *Intangible Assets*.
- Entity X entered into an agreement to purchase services from a third party over a one-year period and has agreed to pay that party 12 Bitcoins (i.e., one Bitcoin per month) in exchange for the services.

Issue 1: How should Entity X account for its agreement to purchase services in exchange for Bitcoins?

View 1A – The services received should be measured at the fair value of the Bitcoins exchanged.

Proponents of this view analogize to the guidance in IAS 38 for exchanges of non-monetary assets. Paragraph 45 of IAS 38 states, in part, that “[t]he cost of such an intangible asset is measured at fair value unless (a) the exchange transaction lacks commercial substance or (b) the fair value of neither the asset received nor the asset given up is reliably measurable.”

Under this view, the transaction has commercial substance and should be recognized at the fair value of the Bitcoins given to exchange for the services. Entity X would recognize the difference between the carrying value of the Bitcoins given up and the fair value of those Bitcoins in profit or loss.

View 1B – The services received should be measured at the carrying value of the Bitcoins exchanged.

Proponents of this view note that View 1A is for exchange of intangible assets and does not apply to exchanges of non-monetary assets for services. Therefore, the services should be recognized at the carrying amount of the Bitcoins exchanged.

View 1C – Entity X has an accounting policy choice.

Proponents of this view think that there is no guidance in IFRS Standards regarding exchanges of non-monetary assets for services; therefore, an accounting policy choice exists.

The Group's Discussion

Group members supported the view that Entity X should measure the services it received at the fair value of the Bitcoins exchanged (View 1A).

One Group member noted that in Fact Pattern 1, Bitcoins were accounted for as an intangible asset. Entity X disposed of the intangible asset and in accordance with paragraph 116 of IAS 38, the amount of consideration to be included in the gain or loss arising from the derecognition of the intangible asset is determined in accordance with IFRS 15 *Revenue from Contracts with Customers*. Paragraph 66 to 69 of IFRS 15 then provides guidance on measuring non-cash consideration at fair value, which provides support for View 1A.

A few Group members commented on the challenges with measuring the services received at the carrying value of the Bitcoins. Under View 1B, the measurement of the services can differ based on when the Bitcoins were acquired, which seems to produce an illogical outcome. It is more reasonable to associate the fair value of the services with the fair value of what is given up to attain the services. In this case, the fair value measure would be of the Bitcoins paid to the third party.

Some Group members also noted that the mode of payment should not change the cost of the service. This means that whether the services were paid with Bitcoins, U.S. Dollars or gold, the services should be at fair value. There was some discussion as to whether the fair value should be the Bitcoin itself, or the fair value of the services rendered. The Group noted that judgment would be applied to determine which fair value would provide the better measure. One Group member also thought that entities should consider whether there could be an embedded derivative in the arrangement.

Fact Pattern 2

- Entity Y entered into an agreement with one of its employees under which the employee will receive Bitcoins in exchange for providing services for three years.
- The number of Bitcoins that the employee will receive was determined up-front (i.e., nine Bitcoins) and the employee will receive the Bitcoins over the three-year term of the agreement (i.e., three Bitcoins per year). If the employee leaves Entity Y during the three-year term, he or she will be entitled to a pro rata share of the Bitcoins earned to the date of termination or departure.

Issue 2: Are transactions in which an entity receives employee services in exchange for cryptocurrencies accounted for in accordance with IAS 19 Employee Benefits?

Analysis

The granting of Bitcoins to employees in exchange for services falls within the scope of IAS 19 based on guidance in paragraphs 2 and 8 of IAS 19.

Paragraph 2 of IAS 19 states that “[t]his Standard shall be applied by an employer in accounting for all employee benefits, except those to which IFRS 2 *Share-based Payment* applies.” In addition, paragraph 8 of IAS 19 states that “[e]mployee benefits are all forms of consideration given by an entity in exchange for service rendered by employees or for the termination of employment.”

An entity should consider the following when accounting for an arrangement in which an employee receives cryptocurrencies in exchange for providing services:

- Is the arrangement considered a short-term employee benefit or a long-term employee benefit?
- Does the arrangement meet the definition of a defined benefit plan or a defined contribution plan? If the arrangement is a defined benefit plan, the entity needs to consider the actuarial assumptions to be used in estimating the defined benefit obligation and the related expense.
- Are the Bitcoins that will be used to settle the obligation within an employee trust or have they have been set aside by the entity?

The Group’s Discussion

The Group agreed with the above analysis, noting that the scoping paragraphs of IAS 19 would capture this type of transaction. The Group acknowledged the complexities involved in applying the IAS 19 measurement model, including the need to acquire actuarial assistance to determine the required assumptions related to the award.

The Group also discussed the following issue that was deferred from its June 2018 meeting.

Issue 3: Is there an active market as defined by IFRS 13 Fair Value Measurement that allows measurement of cryptocurrencies at fair value?

Analysis

IFRS 13 gives precedence to observable inputs over unobservable inputs, with Level 1 of the fair value hierarchy being quoted prices in active markets for identical assets or liabilities that an entity can access at the measurement date. IFRS 13 defines an active market as “[a] market in which transactions for the asset or liability take place with sufficient frequency and volume to provide pricing information on an ongoing basis.”

An entity should consider the following factors when determining whether there is an active market for a particular cryptocurrency:

- IFRS 13 requires that the principal market for the cryptocurrency be determined as the market with the greatest volume and level of activity for that cryptocurrency. There may be several markets for a particular cryptocurrency.
- The entity must also have access to the market (e.g., some markets may be open only to constituents of a particular country).
- Some markets may trade in fractions of units of cryptocurrency, while others may trade in whole units. Therefore, the unit of account needs to be considered.

- The timing of measurement should also be considered as some exchanges may operate on a 24/7 basis. In such cases, the time at which the entity measures the cryptocurrency is important, given some cryptocurrencies experience significant pricing volatility.

It is possible that not all cryptocurrencies will meet the criteria for Level 1 in the fair value hierarchy, and that the hierarchy level for a particular cryptocurrency may change over time.

The Group's Discussion

Group members agreed with the analysis above, noting that whether there is an active market will depend on the type of cryptocurrency being held. It is important that entities include sufficient disclosures in their financial statements to help users understand the judgments made when determining whether there is an active market. One Group member noted that the judgments made would be similar to those made related to financial instruments that are traded in less established markets.

A Canadian member on the IFRS Interpretations Committee noted that the Committee discussed determining fair value for cryptocurrencies at its [September 2018](#) meeting. A question was raised at the Committee as to the type of valuation model that would be applied to determine the fair value if an entity determined that there was no active market. In addition, there were some concerns expressed about the possibility of fraudulent transaction volumes in less transparent markets, a point that is not specifically contemplated in IFRS 13.

A representative of the Canadian Securities Administrators echoed the importance of providing sufficient disclosures to enable financial statement users to understand how the fair value of a particular cryptocurrency is determined. It is challenging to conclude that for some of the more mainstream cryptocurrencies, there is no active market. Judgment would be needed to determine which is the principal or most advantageous market given the different exchanges on which a particular cryptocurrency may be traded.

Overall, the Group discussed this topic of cryptocurrencies to raise awareness. No further action was recommended to the AcSB.

(For a full understanding of the discussions and views expressed, listen to the [audio clip](#)).