



**MOBILE TERMINATION ACCESS SERVICES  
INVESTIGATION**

**SUBMISSION ON UNDERTAKINGS  
SUBMITTED 2 OCTOBER 2009**

**PUBLIC VERSION**

**16 October 2009**

## CONTENTS

<b>1</b>	<b>EXECUTIVE SUMMARY .....</b>	<b>3</b>
<b>2</b>	<b>PRICE TERMS .....</b>	<b>4</b>
	Price comparison .....	4
	2 Degrees' undertakings.....	5
	<i>MTRs for voice</i> .....	5
	<i>Lack of glide path for voice MTRs</i> .....	5
	<i>MTRs for SMS</i> .....	6
	Vodafone's undertaking.....	7
	<i>MTRs for voice</i> .....	7
	<i>Vodafone's MTRs are based on minute + second</i> .....	7
	<i>Vodafone's glide path is shallow relative to Telecom's</i> .....	8
	<i>MTRs for SMS</i> .....	8
<b>3</b>	<b>NON-PRICE TERMS .....</b>	<b>9</b>
	Whether or not differences in Vodafone's and 2 Degrees' non-price terms are material .....	9
	Response to comments from 2 Degrees on Telecom's non-price terms .....	9

## 1 EXECUTIVE SUMMARY

- 1 Telecom is grateful for the opportunity to comment on the undertakings proposed by Vodafone and 2 Degrees.
- 2 Telecom generally supports the mobile termination rates (**MTRs**) for voice services proposed by Vodafone but we consider that ours are more likely to be acceptable to the Commission on the basis that they deliver more benefits to consumers in the first two years. A hybrid approach, taking the lowest price in the two proposals for each year of the glide path, may be a solution to explore at the workshop.
- 3 We do not support the MTRs for voice submitted by 2 Degrees as they are not referenced to the likely outcomes of applying a TSLRIC pricing methodology in New Zealand in the way that Telecom and Vodafone's are. Furthermore, 2 Degrees' assumptions around future cost reductions are overstated. In addition, the lack of a glide path creates real risks of shock to end users and the industry. Finally, we do not consider it would be operationally possible to implement a change to interconnect billing arrangements in the timeframe 2 Degrees proposes.
- 4 The more measured but significant reductions in MTRs included in Telecom's and Vodafone's Undertakings are more reflective of the commercial realities and also of international best practice in relation to making material changes to MTRs. However, Vodafone's undertaking offers a slower reduction in MTRs over the first few years.
- 5 As for SMS, a pure Bill and Keep (**BAK**) approach, as proposed by 2 Degrees, opens up a real risk of arbitrage with no discernible upside. In commercial agreements if there is a material imbalance in traffic then there is scope to renegotiate the agreement. Providing an opportunity for renegotiation in an undertaking is not practical, which further supports the Hybrid BAK model. Telecom's proposal for out-of-balance traffic makes allowance for unusual circumstances and provides for a way of dealing with these in a transparent manner. We remain of the view that Hybrid BAK provides better incentives to the relevant parties by ensuring incentives are in place which would work to support economically efficient behaviours at the wholesale and retail level.
- 6 While there are some differences in the non-price terms, in our view, the differences are such that they could be aligned if there is agreement as to price.
- 7 Key benefits of an undertakings driven outcome are that it can yield benefits to consumers faster, be less costly to implement, and provide earlier certainty to the industry than a regulated outcome. Accordingly, we hope that these advantages will be taken into full account when the Commission weighs up the acceptability and appropriateness of the undertakings.

- 8 We believe that overall the undertakings provided by Access Providers illustrate that the industry is keen to try to reach a commercial outcome and that there is real value in the Commission holding a workshop to facilitate this outcome. Telecom looks forward to constructively engaging with the Commission and the industry on the way forward.

## 2 PRICE TERMS

### Price comparison

This table shows a price comparison between the undertakings submitted by the Access Providers, which takes out the effect of the differing charging bases:

Date from	Telecom	Vodafone	Vodafone Adjusted <sup>1</sup>	2 Degrees
1 Jan 2010	12 m+s	15 m+s	15 m+s	5.56 s+s
1 July 2010	12 s+s	12 m+s (April)	14.76 s+s (April)	
1 Jan 2011	10 s+s	10.5 m+s	12.92 s+s	4.73 s+s
1 Jan 2012	9 s+s	9 m+s	11.07 s+s	4.25 s+s
1 Jan 2013	8 s+s	7 m+s	8.61 s+s	3.83 s+s
1 Jan 2014	7 s+s	5 m+s	6.15 s+s	3.64 s+s
SMS	B+K (hybrid) Overage @ 7% = 3cpt, @ 12% = 8cpt	1.2 cpt	1.2 cpt	B+K (pure)

This table was prepared on the assumption that 2 Degrees' undertakings are intended to be provided on a second + second charging model. However we note that the drafting in 2 Degrees' undertakings is ambiguous on this point<sup>2</sup>.

---

<sup>1</sup> The "Vodafone Adjusted" column converts Vodafone's MTRs beyond the first period to a second + second basis for comparison with the MTRs from Telecom and 2 Degrees.

## **2 Degrees' undertakings**

### ***MTRs for voice***

- 9 The MTRs 2 Degrees proposes for year 2010 in its undertakings are based on costs derived in Australia by WIK. These MTRs are then reduced further by assumptions around how costs might change over time. Telecom considers this approach does not produce an appropriate proxy for the benefits that would be achieved by correctly applying a TSLIC approach to pricing in New Zealand.
- 10 More specifically, as NERA submitted on 6 May 2009, the ACCC made a number of observations as to why the WIK model would result in lower prices than could be achieved by appropriately applying TSLRIC to pricing in Australia:
- (a) *"The WIK model [...] assumes efficiencies that may not be obtainable in a rollout under competitive conditions."*
  - (b) *"The cost estimates derived from the WIK model [...] cannot be considered conclusive in determining an appropriate indicative price."*
  - (c) *"The ACCC considers that the WIK model provides an estimate of the TSLRIC+ of supplying the MTAS somewhat lower than that achievable in reality."*
- 11 If the Commission is minded to align MTAS pricing with Australia's, the Telecom approach of using the actual Australian MTAS rate for 2011 and then providing a discount off that rate would provide a better reflection of an appropriate MTR.
- 12 Furthermore, 2 Degrees' assumptions around cost reductions beyond 2010 are overstated. They may be applicable as percentage reductions from higher starting prices, but coupled with the very low starting MTRs proposed by 2 Degrees, they would not represent an achievable cost path. We accept that there will be cost reductions over time, but these should be modelled as either a material reduction up-front or an ongoing decline, not both.

### ***Lack of glide path for voice MTRs***

- 13 The immediate reduction in MTRs in the first year, going to 5.56 cpm for 2010 as compared to the counterfactual of 15 cpm in that year, does not reflect the realistic amount of time it would take to make the necessary flow-on adjustments to other prices that would result from changing MTRs. The more measured reductions in prices of the Telecom Undertaking are more reflective of the commercial realities and also of international best practice in relation to making material changes to MTRs.

---

<sup>2</sup> See for example note 2 below the proposed MTRs which refers to the duration being "rounded up to one minute", which seems to imply a minute + second approach to pricing. We note, however, in 2 Degrees' submission that it states prices are on a per second basis and individual call charges are not rounded up to the nearest whole cent (see paragraph 12).

14 Further, 2 Degrees appears to be proposing that second + second charging be implemented from the acceptance date of its undertakings. Telecom does not consider it would be operationally possible to implement a change to interconnect billing arrangements in this timeframe.

***MTRs for SMS***

15 2 Degrees proposes that a pure BAK model be applied for SMS termination. Telecom notes that this approach would advantage Telecom relative to 2 Degrees by comparison to the Hybrid BAK model proposed by Telecom. However Telecom expects that this situation will not last long and that relative SMS traffic flows will move close to being in balance over time.

16 In this context, a Hybrid BAK model with a 7% threshold as proposed by Telecom should have the same payments (zero) as pure BAK. Any material and ongoing imbalances in SMS traffic are likely to be the product of distortionary factors in the market or behaviour that may be undesirable. One of these is SMS spam. A Hybrid BAK model can mitigate against the risk of these undesirable behaviours arising in the first place; a pure BAK model cannot.

17 2 Degrees notes that international SMS agreements normally provide for BAK. This is true but it overlooks the fact that there are provisions in such agreements that if there is a material imbalance in traffic that there is scope to renegotiate the agreement.

18 Providing an opportunity for renegotiation in an undertaking is not practical as it is effectively saying that there is no real agreed price, just a placeholder. An undertaking is not a fully commercial agreement – it is an alternative to regulation. As such, it needs to provide for the price that should be applicable in all situations, not just the normal or expected case. Telecom's proposal for charges being applied to out-of-balance traffic makes allowance for unusual circumstances which could arise, and provides for a way of dealing with these that is transparent. This would then avoid any future disputes over how to deal with traffic that was imposing an unexpected net cost on the receiving party.

19 Under a regulated service, there is no opportunity for renegotiation, and accordingly it is important to ensure that regulation preserves, to the extent possible, the economic incentives which would exist in the open market. Hybrid BAK ensures that all parties are provided with incentives which would work to support economically efficient behaviours at the wholesale and retail level.

20 The economic role of interconnection charges in relation to SMS is to generate funds for each party jointly consuming the service which cover the resource costs of providing the service, (and including remunerating for the risks of investment), in a way that leads to economically efficient consumption of the service. In theory, if SMS traffic is balanced and this balance will not change through market evolution, or actions of the parties, then "pure" BAK will not impact on efficiency.

- 21 In the real world, however, even if traffic is close to or in balance at some point in time, that balance is likely to change. Either evolving market conditions, or actions of the parties, have scope to alter this balance. The flexibility of Hybrid BAK provides an incentive to operators to manage business operations in the face of changing market conditions in a more economically efficient manner.
- 22 In practice, parties either negotiate a Hybrid BAK arrangement or have the ability to renegotiate as described above. Accordingly, in these circumstances, operators have more or less economically efficient incentives. Under pure BAK, however, unless SMS traffic is close to balance over time, a range of economically inefficient incentives will arise.
- 23 A terminating network which is receiving more SMS traffic than it is sending may well be incented to target customer groups who initiate more traffic than they receive and to deter customers who receive more traffic than they initiate. For example, there might also be a disincentive for that operator to invest in additional capacity for the interchange of SMS messages between networks, resulting in variable delays in the delivery of SMS messages.
- 24 An originating network in the same circumstances will have the opposite incentive in targeting customer groups and similar incentives in relation to investment in SMS specific capability. Under either of these circumstances it will follow that consumer welfare would be impaired. Hybrid BAK avoids these outcomes.
- 25 The 2 Degrees suggestion that a charge for out of balance traffic would create incentives to raise retail prices ignores the fact that texting is a one-way product used to facilitate two-way communication. 2 Degrees appears to have accepted the comment by Dr Small that texts outwards produce texts back. When texts outwards are generally returned, as the traffic balance figures show happens, raising prices doesn't raise net inwards text revenues. It simply encourages customers to take their business to a competitor.

### **Vodafone's undertaking**

#### ***MTRs for voice***

- 26 The MTRs Vodafone is proposing are within the likely benchmark range of international rates, albeit towards the upper end. As such they should be considered capable of acceptance. However, Telecom considers that the rates it has proposed, if agreed across the industry, would provide greater immediate benefits to end users than those proposed by Vodafone. Telecom could, however, agree with the MTRs Vodafone has proposed if the Commission were to indicate that it preferred Vodafone's proposed rates. However, Telecom does have some specific comments on the proposed MTRs as set out below.

#### ***Vodafone's MTRs are based on minute + second***

- 27 Vodafone's undertaking proposes that MTRs should be applied on a minute + second basis ongoing. While it is possible to factor the charging basis out in

prices, the Commission has indicated that a second + second charging basis is the preferred structure.

- 28 Telecom is of the view that second + second charging is actually a less efficient<sup>3</sup> model than some of the alternatives (such as applying a flagfall charge), but it is the approach that is most commonly applied internationally to MTRs. A minute + second model is more efficient for dealing with the costs of missed calls and the like, but is a less common approach<sup>4</sup>.

***Vodafone's glide path is shallow relative to Telecom's***

- 29 Vodafone has proposed a slower reduction in prices over the first few years of its undertaking relative to our Undertaking. After adjusting for minute + second pricing, its rates only fall below those proposed by Telecom in 2014. The greatest benefits to end users appear only in the outer years of its undertaking. We consider that delivering more benefits to FTM callers sooner would be more acceptable to the Commission.
- 30 Both the CBA and Vodafone's undertaking should reflect only the effects on the market for five years. This is the general duration of an undertaking under the Telecommunications Act. We note that there is the provision for an undertaking to be provided for a longer or shorter timeframe under the Act in certain circumstances. However, as a timeframe of greater than five years has not been explored in the process to date, we do not consider it helpful to look beyond the five year term at this stage.
- 31 Given the timeframe that should be applied, it becomes more important that the benefit of alignment of undertakings MTRs with costs takes place earlier than Vodafone has proposed. Telecom's Undertaking provides for this, and represents the best balance between reducing MTRs and providing a reasonable period for the industry to make the necessary flow-on changes to its other prices.

***MTRs for SMS***

- 32 Vodafone has proposed to continue with MTRs for SMS, but to set them at a rate well below current prices. These rates may be a better reflection of costs than current rates, but the structure of pricing does not reflect the potential incentives that are created in relation to out-of-balance traffic. A Hybrid BAK model means that for the most part there will be no charges between carriers, but that there are meaningful disincentives to providing out-of-balance traffic. Having a small change for out of balance traffic, as is the net effect of Vodafone's proposal, would simply result in a billing overhead for a relatively modest amount of net revenue. It is difficult to see that the net revenue produced would outweigh the transaction costs of billing.

---

<sup>3</sup> In the sense of aligning the structure of costs with the structure of revenues.

<sup>4</sup> Only being applied by Norway within the set of countries selected by the Commission for benchmarking.

### 3 NON-PRICE TERMS

#### **Whether or not differences in Vodafone's and 2 Degrees' non-price terms are material**

- 33 There are a number of material differences between the non-price terms in Telecom's Undertaking and those in the Vodafone Undertaking. We have attached as Appendix 1 a table detailing these differences. Given that 2 Degrees has adopted the previous Vodafone Undertakings format (with some notable differences) we have not completed a detailed analysis of the differences between Telecom's and 2 Degrees' undertakings but have instead made some high level comments. We anticipate that the differences identified in the Appendix will form the basis for discussion at the workshop should the Commission elect to proceed with one.
- 34 We draw the Commission's attention to the two non-price differences between Vodafone's and Telecom's Undertakings that we consider are most material, namely:
- (a) Vodafone has retained minute + second billing increments for voice calls (see our MTR comparison table in the Price Terms section of this submission) while Telecom implements second + second billing from 30 June 2010;
  - (b) Vodafone excludes internationally originated mobile calls from the MTAS service whereas Telecom has included this call type in the definition of "Mobile Call" meaning that the price for internationally originated mobile calls aligns with domestic FTM and MTM calls.

#### **Response to comments from 2 Degrees on Telecom's non-price terms**

- 35 2 Degrees made a number of comments on Telecom's Undertaking on page 12 of its 2 October 2009 submission which we address below:
- (a) 2 Degrees questions the non-reciprocal nature of the set up costs for routing, billing and technical system changes required for a new party to interconnect with Telecom. At the risk of repeating the points from our 6 May 2009 submission, we note that Telecom incurs one-off costs for building all the services and interfaces necessary to establish interconnection with a new network operator. We reasonably seek to recover these costs from the Access Seeker who wants the benefit of access to our customer base. In Telecom's experience our costs tend to be far greater than those of the Access Seeker largely due to the extent of our network and the work involved. There is nothing that Telecom specifically requires the Access Seeker to establish, so it is in our view unlikely that the charges would apply in reverse. These charges are a longstanding and commercially accepted component of our interconnection agreements and are designed to recover the costs of

establishing interconnection with a new party. Clause 3.1b of Schedule 4 of the Telecom Undertaking clarifies that these charges do not apply to the change to per-second invoicing or the transition to handover of traffic at the MSC from 30 June 2010.

- (b) 2 Degrees questions the charges for connection to a Handover Point but given that these are reciprocal we are not sure of the basis of its complaint.
- (c) The charges for interconnection links to which 2 Degrees objects have been removed from the Telecom Undertaking as the provision of interconnect links is not part of the MTAS service given the move to MSC handover.
- (d) In line with the adoption of the MSC handover obligation, Telecom has deleted the 3.5c origination charge if FTM traffic originating on the Telecom network is not handed over at the local point of origination.
- (e) 2 Degrees comments on the reciprocal ability for either party receiving Text Messages to terminate that Text Message service in a number of situations. However, 2 Degrees does not articulate the nature of its concern with this or suggest an alternative. Accordingly, we have nothing further to add on this topic.
- (f) 2 Degrees alleges that clause 17.4 of Schedule 1 of the Undertaking is in some way anti-competitive but in no way substantiates that allegation. Clause 17.4 was a feature of the determined interconnection terms in the Commission's Decision 477 and has been included in all our interconnection arrangements since Decision 477 without complaint.
- (g) 2 Degrees suggests that the interest rates for overdue amounts are too high. These interest rates apply reciprocally and we believe provide an appropriate incentive to both parties to pay on time and bill accurately. If an Access Seeker pays on time and bills correctly the interest rates are not relevant.