

Broadband Steering Group

Minutes of the Meeting held on the 19th October 2016 @ 7:30 p.m. Fernaig House

1 Present and Apologies

Present: Phil Game, Joe Grimson, Mary MacBeth, Neil MacRae

Apologies: Hamish Howat Hurst

2 Approve and adopt previous minutes

The previous minutes for July, were approved, proposed by Mary, seconded by Neil.

Copies of previous minutes are on our website at:-

<http://www.stromeferry-and-achmore.co.uk/index.asp?pageid=433827>

Email cmnetcic@gmail.com if you would like to be put on the circulation list or you have any questions.

3 Chairman's report

We are pleased to welcome Kate Biss as a director.

3.1 Bandwidth

Bandwidth is mostly holding up well, but the stats for September and October have been distorted by the cyber attack (see 3.2 & 7.1). Time has been spent updating and testing the account management software so the Lochcarron line can be brought into use; the software is now in the final stages of testing.

3.2 Cyber Attack

As Joe reports in 7.1 below we were subject to a cyber attack in September / October which infected all the equipment in Braeintra and the lower relay on Creag Mhaol. This took several days to resolve partly because the poor weather made it difficult to get up to the relay so we could replace the kit.

In addition to the firewalls on everyone's Air Router / AirGateway we have firewall in Plockton and Lochcarron. These work to defend against attack from the "outside", however we now realise we do not have sufficient barriers in place to prevent attack from the "inside", in the longer term we will restrict internal access.

We are now faced with a dilemma; to defend ourselves against future cyber attacks we have had to upgrade to a later version of the Ubiquiti firmware; however the latest versions of the firmware are known to have bugs related to the implementation of RADAR avoidance in the UK versions. This means we cannot just upgrade to the latest versions but will have to upgrade or replace selective devices should they show problems. At the moment the only device showing signs of problems is the access point for Fernaig.

We have upgraded our network management software to allow us to continue to monitor the system and record logs and will look at upgrading a second package (The Dude) to provide more network management information.

3.3 Admin Overhead

Most of the last two months has been spent on the accounts. A major review was required and we have had to go back to our first accounts and alter them to make sure we take advantage of the Annual Investment Allowance. If we had not done this we would be due to pay tax on our capital expenditure on electronic equipment. HMRC granted us an extension of one month to review and submit our accounts; even so the volume of work involved meant they were finally delivered with less than 48 hours to run on the deadline. The final replacement documents for earlier returns were sent off to HMRC and companies house this week.

Over the past two months we are finding that far too much time is being spent chasing up subscribers. Would everyone please pay invoices promptly and return contracts as soon as possible.

We would like to remind everyone that our resources are very limited and time spent chasing up payments or documents is time that cannot be spent improving the system or installing equipment for new subscribers.

We hope that the new reduced tariff will mean that subscribers opt for the correct tariff and rarely if ever exceed their quota.

It was agreed that we would consider introducing an administration fee to encourage subscribers to respond promptly if the situation does not improve.

3.4 WHAN

See 8.6.1 for details on the latest WHAN meeting.

3.5 Year three Tariff

For our first two years of operation the bandwidth constraints of slow lines rated at 7 Mbps download meant that our tariff had to be designed to discourage high usage. In year two 10 GB cost £10 and 20 GB was nearly double at £19.

We are about to take delivery of our first fibre line in Plockton and we expect this line will deliver download speeds over 8 times faster than our first slow lines whilst being 30% cheaper. We estimate that the new fibre line will have enough capacity for over 120 subscribers at today's average usage.

For the first time we find ourselves in a situation where we are not constrained by bandwidth capacity.

We discussed next year's tariff looking at the likely scenarios in terms of the number of subscribers and the volume of data used.

There are two components to the tariff:-

A standing charge per installation to cover fixed overheads; electricity, insurance, replacement of kit etc - which has been set at £5 pm

A variable charge to cover the backhaul used - which has been set at £3 per 10 GB per month.

Next year's tariff is therefore:-

10 GB - £8, 20 GB - £11, 30 GB - £14, 40 GB - £17, 50 GB - £20, 60 GB - £23, 70 GB - £26, 80 GB - £29 etc

The tariff comes into effect on the 1st December 2016.

Everyone who has been a member of CMNet for two years on the 1st December 2016 will automatically move to the new tariff.

Our policy is that there will be no advantage for any subscriber who defers joining to wait for a reduction in the tariff.

This remains the case but we have also decided to allow those heavy users who have less than two years membership to have some of their payments credited to "buy" more months membership.

If someone had joined CMNet two years ago at the base 10 GB package they would have paid £13.50 for the first year and £10 for the second. So to be eligible for the third year tariff of £8 they have paid $(£13.50 - £8) * 12$ and $(£10 - £8) * 12$ above the third year rate of £8; this equals £90.

£90 is the premium paid by all subscribers who joined CMNet "early".

We have therefore decided to credit subscribers at the differential rate above the third year tariff and calculate their contribution towards the £90 premium on that basis.

Some examples should help clarify the situation:-

10 GB - There will be no additional months allowance for subscribers on 10 GB, this is the baseline.

20 GB - The first year monthly rate is £25. The premium is therefore $£25 - £11$ (the third year rate) = £14. At £14 a month the £90 premium will be reached at 7 months. Anyone who has been on the £25 subscription for 7 months or more will automatically move to the year three tariff of £11.

30 GB - The first year monthly rate is £36. The premium is therefore $£36 - £14$ (the third year rate) = £22. At £22 a month the £90 premium will be reached at 5 months. Anyone who has been on the £36 subscription for 5 months or more will automatically move to the year three tariff of £14.

40 GB - The first year monthly rate is £47. The premium is therefore $£47 - £17$ (the third year rate) = £30. At £30 a month the £90 premium will be reached at 3 months. Anyone who has been on the £47 subscription for 3 months or more will automatically move to the year three tariff of £17.

All existing subscribers will be credited at the rates outlined above which will be adjusted if necessary where subscribers have changed their quota.

We are asking subscribers who come close to or exceed their monthly quota to take advantage of the reduction in charges to move to a more suitable tariff to ensure they do not exceed their quota and do not create additional administration workload for the CMNet team.

We will adopt a similar policy for new joiners, again working on the £90 premium paid by subscribers on the first two years.

Again some examples might help clarify the situation:-

10 GB - There will be no reduction on 10 GB for a one year contract it remains £13.50, this is the baseline, which will reduce to £10 in year two and £8 in year three. However we now offer a two year contract for £11.75 per month after two years the rate will change dependant on the as yet undecided year 4 rate.

20 GB - Current tariff £25, with a one year contract the cost now drops to £18.50 pm for 12 month (£11 year three rate + £90 / 12) after one year the rate will drop to £11. A two year contract costs £14.75 pm for 24 month (£11 + £90 / 24) after two years the rate will change dependant on the as yet undecided year 4 rate.

50 GB - Current tariff £58, with a one year contract the cost now drops to £27.50 pm for 12 month (£20 + £90 / 12). A two year contract costs £23.75 pm for 24 month (£20 + £90 / 24) after two years the rate will change dependant on the as yet undecided year 4 rate.

We are still offering packages rising in units of 10 GB per month as before.

3.6 CBS

Nothing to report.

3.7 Subscribers

3.7.1 Existing relays

Live subscribers - 32

Subscriber installation pending - 1

3.7.2 Live relays but waiting for backhaul

Kit installed - 0

CMNet installations pending - 0

Subscriber installations pending - 0

Total number waiting for backhaul - 0

3.7.3 Waiting for new backbone relays

Waiting for surveys - 3

Waiting for installations - 30

3.7.4 Others

On live access points but requested a delay - 2

No response when asked for an installation date - 2

Withdrawn from CMNet since the last minutes - 0

New joiners since the last minutes - 0

Total - 70

No change this month.

3.8 Terms of Reference

Deferred

4 Secretary's report

4.1 Risk register

No change this month. **Action: Mary**

4.2 Long term support plan

No progress this month. **Action: Mary**

4.3 Update Bank Account details

Mary went to RBS Kyle to check all the forms were in order and the Kyle branch of RBS then forwarded the completed forms to head office who then requested another form be completed. Mary has obtained all the relevant signatures and sent off the new form. **Action: Mary**

4.4 Zen Refund

Mary has contacted Zen to ask for a refund for the installation of the ADSL line in Lochcarron, Zen will contact Openreach. **Action: Mary**

4.5 Zen ADSL in Plockton upgrade to fibre

We have been informed by Zen that this will be installed by the end of October. We will free up the line so there is no interruption to service whilst the changes are made by Openreach and configure and install a new router. **Action: Phil**

4.6 Companies House

Revised accounts have been sent to replace 2014 & 2015. **Completed**

4.7 HMRC

Revised accounts and returns have been sent to replace period end 13th August 2014 and period end 31st August 2014. Period end 31st August 2015 were submitted. **Completed**

4.8 Terms of Reference

Deferred

5 Finance Director's Report

5.1 Monthly Statistics

There were no monthly reports from Hamish so these figures were produced by Phil; all figures are up to the end of the month.

Capital expenditure claimed against our grant of £37,538:-

Brought forward	- £24,985.75
This period	- £ 0.00
Carried forward	- £24,985.75
No Change	

Revenue August:-

Brought forward	- £4,735.50
Income this month	- £683.24
Expenditure this month	- £1,939.94
Carried forward	- £3,478.80

Liabilities

Estimated Liabilities	- £2,083.00
Estimated balance after liabilities	- £1,295.80

Provision for replacement of Electronic equipment

Total value purchased to date	- £9,000.00
Balance after provision	- £-7,604.20

£1,686.05 of loans and interest on loans was repaid to the CC this month.

Revenue September:-

Brought forward	- £3,478.80
Income this month	- £628.80
Expenditure this month	- £179.00
Carried forward	- £3,928.60

Liabilities

Estimated Liabilities	- £1,912.00
Estimated balance after liabilities	- £2,016.60

Provision for replacement of Electronic equipment

Total value purchased to date	- £9,000.00
Balance after provision	- £-6,983.40

5.2 Outstanding subscribers' debt

Total outstanding debt as of the date of the meeting £0.00

Some subscribers are in credit and due refunds and some are due replacement cheques these have been delayed due to resources being directed at the accounts and the cyber attack. Please accept our apologies for the delay; we hope to get the backlog cleared by the end of October.

5.2.1 Next three month's budget and cash flow

Direct debits for the Hydro bills are to be set up. **Action: Hamish**

Mary is to claim back the cost of the last Hydro bill. **Action: Mary**

5.2.2 Housekeeping

Phil has developed a basic accounting and reconciliation package for subscriber payments. It will be enhanced to reconcile our supplier accounts. **Action: Phil**

5.3 Payments for installations of subscriber's equipment

All payments are up to date.

5.4 Standing orders

All payments are up to date; some refunds are still outstanding and there will be a separate meeting to prepare letters and cheques **Action: Joe, Phil**

5.5 *Loan Contracts*

One loan repayment cheque has dissolved in the rain a new cheque will be issued. **Action: Phil, Joe**

5.6 *Additional access to the bank account*

It was agreed we would make Kate Biss a signatory for issuing cheques, Mary has submitted the forms to the bank. **Action: Mary**

5.7 *HMRC return*

We discovered a fundamental flaw in the way our accounts reported capital expenditure and as a result have now employed an accountant who has helped us recalculate all our previous accounts. Updated copies have been sent to HMRC and Companies House. See 4.6 & 4.7 Due to the urgency of approving the accounts there was a special meeting of the directors attended by Phil Game, Joe Grimson, Mary MacBeth, Neil MacRae on 19th September to go through all the base figures, changes were then submitted to the accountant and the final accounts produced by the accountant and submitted to HMRC on the 29th September. **Completed**

6 **Internal auditor's report**

It was agreed we would prepare a synopsis of our current practises, needs and areas of weakness to assist ourselves and the auditor. No progress this month. **Action: Phil**

6.1 *Assets, bf, acquired, relinquished / written off, cf*

No progress this month.

6.2 *Liabilities*

No progress this month.

6.3 *Description of the Audit Trail*

No progress this month.

7 **Customer Relations**

7.1 *Production Environment*

7.1.1 *Problems and complaints*

On the 24th of September the system went down and initial investigations led us to believe that a power supply issue was the problem. After two visits to the power supply box on the hill power was restored but the system was still defective. Further investigation revealed that the CMLow relay was defective and all the units were changed. Investigation of the defective units revealed that they were, in fact, not defective but had reset to the factory default settings. After more investigation by Phil it was discovered that we had been the victims of a Cyber Attack. This particular virus was known to attack Ubiquiti equipment and a "remedial fix" was available. Phil reset all the equipment in Braeintra and carried out remote software changes and eventually returned the system to normal. During this period Braeintra customers were switched to the Lochcarron exchange.

Joe is still having problems updating firmware, this is not a high priority to fix and will be addressed in due course.

Action: Phil, Joe

Joe is not able to access the new version of the Ubiquiti network package (AirControl) Phil and Joe to work through the installation. **Action: Phil, Joe**

7.1.2 *Usage quotas*

The monthly total for August was 469 GB with a daily average of 15.1 GB. **Seven** customers went over their quota in August.

The monthly total for September was 441 GB with a daily average of 14.2 GB. It should be noted that the usage figure for September was affected by the cyber attack and is an estimate. **Four** customers went over their quota in September.

7.1.3 *Possible virus infection*

Nothing reported on subscribers' equipment but a major infestation on the Ubiquiti equipment.

7.1.4 *Installation of domestic equipment*

We are waiting for one subscriber to complete their pre installation work so we can complete their installation.

7.1.5 *Customer Contracts*

Two contracts are still outstanding even after several attempts to contact the subscribers. It was decided we would not chase these any further until the new tariff had been published as it was likely that many contracts will have to be amended.

7.2 *Changes for next month*

7.2.1 *Increases in quotas for existing subscribers*

Several customers have requested and been given an increase in their current quotas.

7.2.2 Additional Management tools / reports

The automatic capping of excessive usage is under review.

7.2.3 Potential personal safety issue

Changes are ongoing. **Action: Phil, Joe**

7.3 Volume trial

7.3.1 Review of the trial

No progress this month. **Action: Phil**

7.4 Terms of Reference

Deferred

7.5 Problem reporting procedure

No progress this month. **Action: Phil**

8 General topics

8.1 Documentation

8.1.1 Mast lease

The Highland Council has asked for electricity consumption figures for the installation at Plockton School - one week after the power monitor was removed! We have also been warned that they might charge a rental fee.

8.1.2 Network Plan

No progress this month due to other commitments. **Action: Phil**

8.2 Relays

8.2.1 Creag Mhaol

We will complete the Ardaneaskan West and Craig installations before doing more work on Creag Mhaol.

Action: Phil

8.2.2 Plockton

8.2.2.1 Hosting agreement

Hamish will add details of the solicitor's quote to the accounts. **Action: Hamish**

8.2.2.2 Equipment and tidy up

No progress this month. **Action: Phil**

8.3 Backbone development

8.3.1 Lochcarron

No progress this month.

8.3.2 Ardaneaskan

All the equipment for Ardaneaskan has been now been received; no progress this month on the installation. **Action: Phil / Joe**

8.3.3 Portchullin

No progress this month. **Action: Phil**

8.3.4 Craig

Once the Ardaneaskan West upgrade is completed we will start work on the Craig installations. **Action: Joe, Phil**

8.3.5 North Strome

No progress this month. **Action: All**

8.3.6 Ardnarff

No progress this month.

8.4 Testing

8.4.1 Management & accounting software

The programs are being system tested and will go live shortly. **Action: Phil**

8.5 Restoring power to the old TV repeater

8.5.1 Removal of equipment from Holly Croft

Phil is to check Eric & Elizabeth are happy with our proposal to compensate them for the use of their electricity. Phil is to tidy up all the equipment left on their premises. No progress this month. **Action: Phil**

8.5.2 Removal of old cable

No progress this month.

8.5.3 Protection of cable on the hill

No progress this month.

8.5.4 Backup Generator

No progress this month.

8.6 ISPs

8.6.1 Community backhaul, West Coast Backbone (WCB)

Phil attended the WHAN meeting on the 14th September. There are problems with the wireless link from Mallaig to SMO and it has been proposed that the wireless link is replaced with a fibre leased line. There was a detailed discussion on **HUBS** costs; costs are now ~ £72,000 a year. It is expected there will be a contribution from the UoE and sponsors to the value of ~£30,000 in the next year.

A charge of £5.52 per subscriber per month has been set for the first year with a maximum monthly usage limit of 100 GB. This model does not provide any incentive for any Community Group to manage usage - the £5.52 is charged on any usage up to 100 GB. There is no suggestion of any bandwidth management apart from the physical capability of the equipment which means one group's performance could be adversely affected by another's. There is no proposal for any network backup routes; any single point of failure would mean no broadband service.

There was a second meeting on the 3rd October which we did not attend (due to the virus intervention); the next meeting is on the 1st November.

8.6.2 ADSL Broadband installation at Plockton High School

We have ordered a high speed fibre line upgrade to the Zen line in Plockton. The new router has been received and will be configured by Phil. The new line is scheduled to be installed by the end of October **Action: Phil**

8.6.3 ADSL Broadband installation at Lochcarron

Work on the implementation of the Lochcarron line has been delayed due to the review of our accounts and the cyber attack. The Lochcarron line will be implemented before the upgrade to the Plockton line. **Action: Phil**

8.7 Implementation

8.7.1 Phase 2 - Relays and creation of access points for the remainder of residents and connect trial subscribers.

8.7.1.1 Equipment

No additional purchases this month.

8.7.1.2 Finalise the properties to be surveyed

We are still waiting on one subscriber to prepare their installations so we can install our equipment.

8.8 Company Logo

No progress this month. **Action: All**

9 Director's training session

9.1 Configuring Ubiquiti and MikroTik equipment

We will organise another training session. **Action: Phil, Joe.**

Joe and Phil went through the management reporting system documentation. Phil will update and extend the document.

No Progress this month. **Action Phil**

Joe and Phil went through the configuration of the Lochcarron router, more training will be organised in due course.

Action: Phil, Joe

The Dude - No progress this month **Action: Phil**

10 AOB

10.1 Proposed changes to the subscribers usage reporting system

No progress this month. **Action: Phil**

11 Items to add to the agenda of the next meeting

None

12 Next meeting

Date of next meeting Wednesday, 9th November 7:30pm at Fernaig House.

The meeting closed at 9:30 pm.