

## Chairman's AGM Report 2020

CMNet is now seven years old and in December it will be six years since the first subscribers joined.

CMNet remains the only provider that can deliver Next Generation Broadband speeds to all the premises in the area at a reasonable cost.

CMNet operates on a cost recovery basis with minimum overheads thanks to everyone volunteering to offer their services for free. We therefore hope that we will not lose any more subscribers to other broadband providers as it is important that CMNet maintains its subscriber base and keeps volumes as high as possible. As the number of subscribers and the volume of data grow our unit costs drop which means everyone benefits from cheaper broadband.

In February we recognised that the Plockton line would not be able to cope with the growth forecast and so we ordered an additional line through Achmore. The installation turned into a nightmare with delay after delay. The additional capacity finally came online at the end of July. It was then rushed into service as flooding in a major BT hub in Edinburgh caused the BT exchange in Plockton to go offline. Because we have fibre lines in three separate locations CMNet subscribers were able to stay online even though Plockton had no broadband.

The average usage of the active accounts is a little over 120 GB per subscriber per month. This year has seen a 15% increase in volumes over the previous year.

Total average monthly usage by year:-

2020 - 4,158 MB  
2019 - 3,600 MB  
2018 - 2,400 MB  
2017 - 1,100 GB  
2016 - 500 GB

There was no change to the tariff this year and no subscription rebate. We invested a considerable amount in capital projects this year which meant we were left with a small surplus not enough to distribute as a meaningful rebate. Although revenues continue to grow and our costs have not increased to the same degree we will have to take a more cautious approach to cutting rates. In future we will have to factor in the risk that some subscribers might leave now that alternative providers are available.

In the past year we have completed all the work on Creag Mhaol and the Portchullin raised beach required to extend the system to subscribers in Ardaneaskan East, North Strome, Strome Ferry and Portchullin. More work will be required before we can connect Reraig. We expect that volumes will grow significantly in the next year. If the new subscribers' average usage is similar to existing subscribers we expect that the current fibre lines will be able to cope with the increased demand.

## **Other topics:-**

### **Long term support plan**

Our software to automatically backup and restore configurations is now being used to configure equipment for new subscribers. It remains our goal to increase the number of people that can support the system. Our new software will give volunteers a simple mechanism to replace any equipment that fails should a CMNet director not be available. The new relays on Creag Mhaol have been designed to be fault tolerant and to automatically switch to a backup unit should the primary unit fail. Our intention is to extend this to the “old” Achmore relays in due course.

### **Electricity supply**

We have seen a considerable increase in electricity costs this year mostly due to increases in the standing charge.

### **Directors:-**

Joe and Georgie Grimson left. Susan Waddle joined and left. Kath Smith joined the board as finance director and after a long struggle with RBS is now able to take full control of our finances.

### **Here is a breakdown by area:-**

**False RADAR (FR)** - There continue to be incidents of false RADAR detection on various access points interrupting the service for a couple of minutes. In some cases the units switch to a poor frequency which reduces the signal strength and sometimes pick a frequency that in conflict with another unit. It has proven to be very difficult to get sufficient data to detect these incidents and we have had to develop software to check and report when frequencies have been changed. This new software is currently under test. We have also been trying to identify incidents via a central log.

**Achmore** - There is an intermittent problem where the access point loses contact with subscribers' antenna. We have developed software to detect this problem and automatically reset the unit.

**Ardaneaskan** - No issues other than FR.

**Braeintra** - One subscriber is losing signal due to an obstruction in their line of sight, they have been informed that the obstruction needs to be removed or their antenna relocated.

**Craig** - No issues other than FR.

**Creag Mhaol** - All the new relays are complete and currently under test. There is a small amount of work required to tidy up the installations.

**Fernaig** - No issues.

**Portchullin, North Strome, Leacanashie, Strome Ferry and Ardnarff** - All these locations are now ready to start installations.

**Achmore** - The new line has been installed in Achmore Hall and is delivering 80 Mbps download and 20 Mbps upload.

**Plockton** - The signal was being degraded by the growth of a tree blocking the line of sight. The dish on Creag Mhaol was moved to another relay and we are waiting on permission to move the dish at Plockton school.

**Lochcarron** - The line has been kept as a backup should Plockton or Achmore be unusable.

**Subscriber's Bandwidth** - Bandwidth limits remain unchanged at 29 Mbps download and 14 Mbps upload. As we all share the available bandwidth speeds will be reduced as the load increases. We are investigating why we do not always show full utilisation of the capacity available at the fibre lines and have started to extend our monitoring to individual network components.

**Equipment** - The hardware continues to perform well with no hardware failures.

**CMNet Software** - We have had a few problems with our server PC in the past year.

**There are many people to thank for their efforts in the past year:-**

I would like to thank Fay Mackenzie who has so kindly given us permission to use Creag Mhaol and The Glen for our relays.

Thanks to Roger Hornby, Dave Whittingham and Beccy Smith, Ken Hopper and Robin Blamey for their help in Ardaneaskan.

Thanks to Andrew and Emma MacKenzie who are hosting equipment which allows us to connect to the BT exchange in Lochcarron.

Thanks to David Geddes who is hosting a relay in North Strome which will allow Strome Ferry to be connected.

Thanks to David Geddes (again), Geoff & Gill Harrington, Ken Hopper (again) and Kath Smith who are all helping with the testing of the new relays.

I would also like to thank all our potential subscribers for being so patient. The relays on Creag Mhaol are now about to complete their final systems tests and we are ready to start to connect new subscribers.

Finally I would like to thank my fellow directors who have all freely given their time and expertise.

Please accept my apologies if I have missed anyone off this list.