



steamsounds *Riding behind steam*

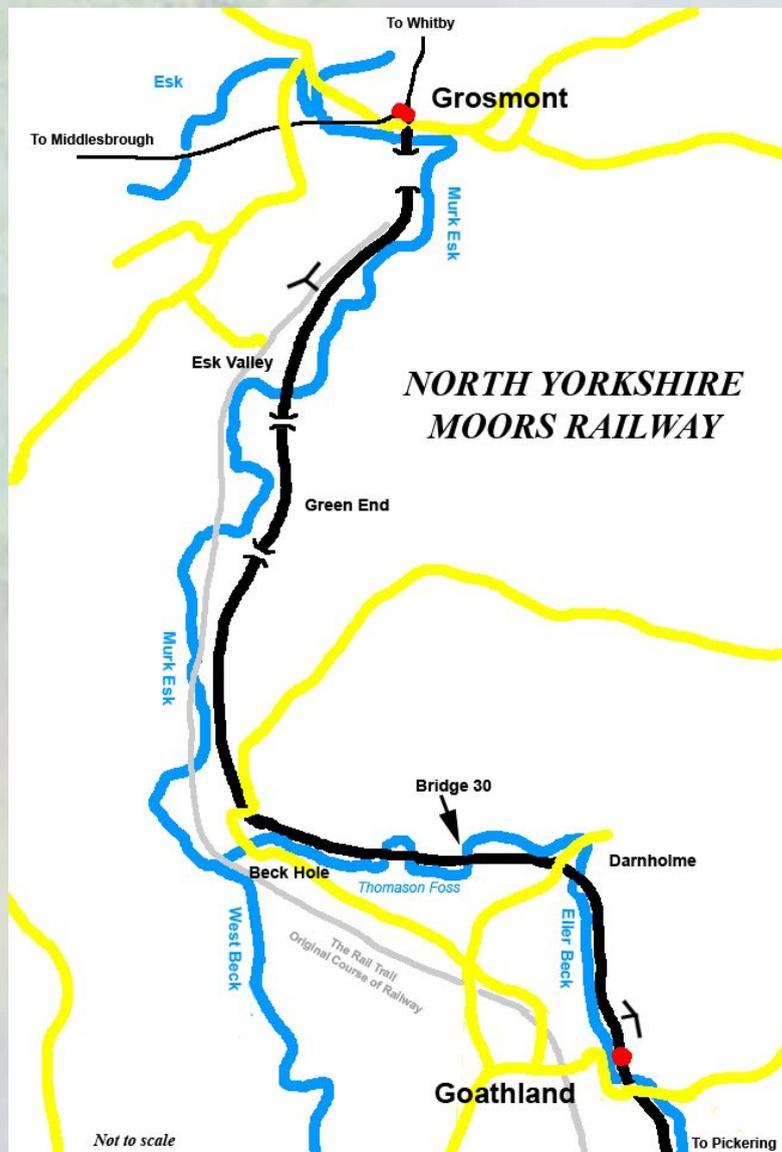
1 in 49!

There are preserved railways with steeper gradients; there are preserved railways with longer gradients but, in my experience, the 1 in 49 climb from Grosmont to Goathland on the North Yorkshire Moors Railway beats them all for sheer noise!

Although I have spent a fair bit of time recording locos on this climb from the lineside, to get the full effect, there is no better place to be than in the front coach.

Hopefully, the 9 tracks on this CD will give a taster of the hard work and good enginemanship required to get heavy trains up this climb.

Turn the volume up, settle back and enjoy the noise but if you've never experienced it for real, try to pay the railway a visit, I don't think that you'll be disappointed!





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1. If you examine the timetable you'll find that trains are allowed 15 minutes for the $3\frac{1}{2}$ mile climb from Grosmont to Goathland and, usually, this can easily be achieved without needing to work locos unnecessarily hard. That's not to say that hard work isn't required both from the locomotive and on the footplate so let's start with just such a run.

The locomotive is the BR Standard Class 4 2-6-0 76079 which, when this recording was made, was a visitor but has since become a resident having been purchased by the railway.

Generally, trains on the railway are quite heavy; today's load of 7 coaches being the norm although longer trains are sometimes required.

Shortly before departure the fireman will have made up a good fire and have a decent level of water in the boiler; nothing worse than setting off from Grosmont ill prepared for what is ahead.

As the recording begins, the driver gets the 'right away' from the guard and sets off, gently at first, over the level crossing just beyond the platform end. Soon after, we enter Grosmont tunnel.

Beyond the tunnel is the loco shed and shortly after passing the driver begins to work the loco a little harder to try to get a little extra speed before the climb begins in earnest.

Once onto the steep gradient the driver opens the loco up a little more as speed begins to fall.

It isn't just the steepness of the climb that makes things difficult; curvature of the track also adds to the resistance and a little more speed is lost round the curve at Green End (following the overbridge passed 5 minutes into the recording) but, once we have passed under the second bridge and are on straighter track you can hear a noticeable acceleration. That acceleration is only short lived as the train soon reaches another sharp curve at Beck Hole Bridge (passed at about $8\frac{1}{2}$ minutes).

The climb continues over bridges past Thomason Foss then Water Ark before rattling over Bridge 30 (at a little over $10\frac{1}{2}$ minutes). There has been a speed restriction on this bridge for years and, as I write this in November 2009, the bridge is in the process of a very expensive rebuild.

At the speed we are going there is no need to ease the loco for the speed restriction and the noise continues unabated under the bridge at Darnholme and through the final cutting up to Goathland.

The top of the climb is right at the platform end at Goathland and 76079 is well into



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the station before the regulator can be closed, no doubt much to the relief of the fireman!

You will have noted that the run from start to stop was completed in only a few seconds under the scheduled time. This is nothing special; this kind of work is the norm day in, day out on the 1 in 49 climb to Goathland.

2. Thrashing steam locos isn't what being a good engineman is about but, as we have seen in the last recording, to maintain the schedule, thrashing isn't required. Indeed, with the more powerful locos on the line, the schedule can be maintained with ease.

One of the most powerful locos to work on the line was the WD 2-10-0 3672.

Built for the War Department in 1944 by the North British Locomotive Company in Glasgow it was shipped to Egypt but never used there, eventually being sold and moved to Greece where it worked until withdrawal in 1979.

The loco was returned to the UK in 1984 and, being a war time engine, was named *Dame Vera Lyn* by the lady herself.

3672 arrived on the North Yorkshire Moors Railway in 1986 and, after extensive repairs over the next 3 years, soon proved itself a reliable performer able to handle almost any load required, occasionally taking 10 coach trains up to Goathland without undue difficulty.

With such a powerful loco, taking the normal 7 coach load up to Goathland in 15 minutes would be very easy work but on the occasion of this recording there were 8 coaches behind tender and we were late leaving Grosmont.

Let me just say that this time the driver did have to ease the loco for the restriction over Bridge 30!

As you have heard in the previous track, 15 minutes is the scheduled time for Grosmont to Goathland but 3672 with one coach more, knocked no less than 6 minutes off that time.

After running over 100,000 miles on the line the loco was withdrawn from service at the end of the 1998 season and, as I write, is still awaiting another extensive, and expensive, overhaul.

3. In 'real' steam days locos from one region rarely strayed off their own patch. Sensible when you think about it as the railway companies who built them often designed locos for specific routes and tasks. With the steam preservation movement it's a different story and locos that might be thought unsuitable for a particular line can sometimes be found at work.

When the ex Southern Railway 'Schools' Class 4-4-0 30926 *Repton* arrived on the NYMR in 1989 there were those who thought that it wouldn't do well on the line,



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after all, down south they didn't have 1 in 49 gradients did they!

Well, once the loco entered traffic the doubters were soon proved wrong as, providing the loco was properly handled, it coped well with the traffic.

There was, however, one thing that the loco didn't handle too well and that was damp, slippery rail conditions; a 4-4-0 wheel arrangement never did lend itself to good adhesive qualities.

This recording was made on a rather damp autumn day when 30926 found itself at the head of a train of 8 coaches, not ideal conditions to have to take a heavy train up to Goathland.

Still, we left Grosmont in fine style and as you can hear, were doing well as we passed under the second bridge at Green End but not far beyond there are trees on both sides of the line. You can probably guess what happened next...

The recording ends at Beck Hole and, although the rest of the climb to Goathland was a bit of a plod, we did make it without further adhesion problems. What's more, we still reached Goathland in just under 15 minutes from Grosmont!

4. In the last track we heard the 3 cylinder Schools having slipping problems and left it near Beck Hole so let's complete the climb to Goathland with another 3 cylinder loco.

This time we are travelling behind the ex LNER A2 Pacific 60532 *Blue Peter* at the head of a 7 coach train. We have just passed Beck Hole bridge going well when the loco slips. The slip is quickly controlled but the driver doesn't press the engine as Bridge 30 with its speed restriction isn't all that far away.

Once over the bridge *Blue Peter* is worked a little harder and begins to accelerate on the gradient and the climb is soon completed in fine style.

5. As you have heard, aside from its steepness, the climb to Goathland can present other difficulties but you wouldn't expect to encounter is a signal check would you? Well, think again.

Trains often cross at Goathland and the usual procedure is to try to ensure that the train coming up from Grosmont isn't stopped on the gradient. For this reason a train arriving from Pickering can often be held for some time outside Goathland station while the train from Grosmont arrives and the line down the bank is clear. I suppose that there is always the slight possibility that a train coming down the gradient could over-run the platform and, while there is a sand drag at the north end of the platform, it's far better if the signalman can set the road for the main line before allowing the Grosmont bound train in.

Signalmen at Goathland usually get this right but occasionally, if a train from Pickering is running into the platform, a train coming up the climb can find



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Goathland's home signal on.

Such was the situation when I made this recording of the ex LNER V2 2-6-2 60800 Green Arrow which is heard on the very last part of the climb.

Sighting the home signal at danger the driver sounds the whistle but to no avail, the signal remains resolutely on and he has no option but to close the regulator and ease gently up to the signal hoping to avoid a stop. Fortunately, just when a stop seems inevitable the signal comes off and we complete the climb into the station.

6. After all these difficulties with adhesion, speed restrictions and signals, let's have a trouble free run behind one of my favourite classes of loco; a Black Five.

The ex LMS Black 5 4-6-0 44767 has been a regular performer on the NYMR over the years and has rarely disappointed me for both noise and performance. This run up the bank to Goathland at the head of a 7 coach train was no exception.

Sit back, relax and enjoy the ride!

7. After that trouble free run I'll bet you thought that the difficulties of working trains up the hill to Goathland were over?

Well, there is one more problem that I haven't yet mentioned and it is the simple one of actually having enough steam in the boiler to make it up the hill.

Now I would be the last person to suggest that any of the firemen on the NYMR ever mishandle their fires (although I have heard of this happening once or twice!) but other factors can cause steaming problems. In this instance, the problem that brought the ex LMS Black 5 4-6-0 45428 to an ignominious halt just above Darnholme was coal. Later, speaking to the fireman, he described the Eastern European stuff that had been delivered to Grosmont as looking just like coal but lacking the usual quality of actually catching fire.

Having been brought to a stand by there being insufficient pressure to keep the brakes off, during the following 10 minute stop the fireman was able to find enough decent stuff underneath the rubbish in the tender to rally the boiler.

This recording is of what followed.

Restarting a 7 coach train on a 1 in 49 gradient isn't something that drivers particularly want to have to do but, fortunately, we had a dry rail and, once under way, the driver was able to use plenty of power; it sounds like full forward gear and the regulator in the roof to me and the noise the Black 5 produced on the last part of the climb we certainly music to my ears!

8. Before we finish, time for two more recordings of the complete climb to Goathland.

The first is one of a loco that always seemed to avoid me when I visited the line but I finally caught up with it at the end of 1992. The loco in question is the North Eastern Railway T3 0-8-0 901, later to become one of the LNER's Class Q7 and



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finally 63460 with British Railways.

This three cylinder loco was designed to work heavy freight trains but in many ways is ideal for working passenger trains on the line as it has plenty of power and plenty of adhesive weight to help avoid slipping.

On this occasion the loco had 8 coaches to take up the bank and the only reason that we took over 14 minutes to reach Goathland was due to the loco showing a tendency to prime when the regulator was fully opened. You can hear the driver trying to work the engine harder but having to ease it to avoid water being carried over into the cylinders in the early stages of the climb but just listen to the acceleration up the final part of the climb!

9. Enthusiast Steam Galas on the NYMR are usually busy but the one held in May 2009 was far busier than most. The increase in visitor numbers was largely due to the presence on the railway of the newly built Peppercorn designed A1 Pacific 60163 *Tornado* which spent a little over a week on the railway.

When I first heard that the A1 was going to be running on the NYMR I was very pleased, expecting that this would be a good chance to hear the loco working hard on the steep gradients. Although I had made lineside recordings of it elsewhere I still felt that there was more to come. Perhaps this was my chance?

During the Steam Gala weekend, as you might expect, trains were very busy so I decided to wait until the middle of the following week when the loco would be working the regular service to have my ride behind it.

Well, here is a recording of the complete climb from Grosmont to Goathland and, as you will hear, 7 coaches on the steep climb provided little difficulty for this fine loco.

Good though this was, I was left with the impression that there is still more to come in the way of noise!

STEAMSOUNDS

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1. 76079 departing from Grosmont to arriving at Goathland.
2. 3672 departing from Grosmont to arriving at Goathland.
3. 30926 from near Green End to Beck Hole.
4. 60532 from near Beck Hole to arriving at Goathland.
5. 60800 arriving at Goathland.
6. 44767 departing from Grosmont to arriving at Goathland.
7. 45428 from Darnholme to arriving at Goathland.
8. 901 departing from Grosmont to arriving at Goathland.
9. 60163 departing from Grosmont to arriving at Goathland.

Stereo digital & analogue recordings digitally edited & mastered

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