# Middleton Railway Trust Ltd. Fireman's Rules Test – Description of Knowledge Required – Version 2

The purpose of a fireman's rules test is to establish that the person being tested has sufficient knowledge and understanding of the Company Rules and Train Operating Regulations to be able to follow correctly the procedures that they specify, and the associated precautions that must be taken, in respect of the relevant aspects of the duties that a fireman is required to undertake. The following list of these aspects forms the basis for conducting such a test, and specifies the detailed requirements for each aspect.

#### Aspects of the Duties for which Sufficiency of Knowledge and Understanding is to be Assessed

#### 1. Before trains are run.

- 1.1 Commencing duties
- (i) Requirements for signing-in, and significance of signing-in;
- (ii) Importance of reading notices, and the significance of the information that should be in them.
- 1.2 Inspecting a locomotive to establish that it is fit to be prepared for traffic
- (i) The aspects that need to be checked initially before lighting up;
- (ii) Procedures for specific checks (particular boiler fittings and gauge glasses);
- (iii) The action to be taken if there are any potential problems.
- 1.3 Preparing a locomotive for traffic
- (i) The specific items that need preparation by the fireman, and the associated procedures;
- (ii) The aspects that need to be checked during preparation;
- (iii) The procedures for water treatment;
- (iv) Precautions to be taken during preparation (eg before operating any controls, and particularly injectors);
- (v) The aspects that need to be checked following preparation (such as safety of tools and fire irons).
- 1.4 Inspecting the line to establish that it is fit for traffic
- (i) The purpose of this inspection;
- (ii) The role of the fireman in the conduct of this inspection.

# 2. Operation of passenger trains under normal circumstances.

- 2.1 Authorisation of train movements
- (i) Establishing the requirements for the train formation;
- (ii) The role of the pilotman in multiple train operation;
- (iii) Requirements and procedures for obtaining permission for train movements by radio.
- 2.2 Shunting in Moor Road station site
- (i) The fireman's role as shunter;
- (ii) Operation of coach brakes, including the relief valve;
- (iii) Coupling and uncoupling coaches;
- (iv) Checking power supply cables and switches on coaches.
- 2.3 Marshalling and preparing a passenger train for traffic
- (i) Procedures to be followed and specific precautions when shunting the coaches.
- (ii) Procedures to be followed for testing the continuous brakes, and the role of the fireman in them.
- 2.4 Starting a passenger train from a station
- (i) The procedure to be followed, and the fireman's role in it;
- (ii) The action to be taken in case of any attempt to board a moving train.
- 2.5 Normal operation of a passenger train
- (i) The importance of maintaining a good lookout;
- (ii) Knowledge of particular features of the line and associated precautions;
- (iii) The importance of minimising smoke production;
- (iv) Responsibilities for instructing cleaners.
- 2.6 Running a locomotive round a train
- (i) Precautions in respect of clearances;
- (ii) Procedures to be followed for un-coupling, operation of turnouts and coupling.

#### 3. Operation of passenger trains under abnormal circumstances.

- 3.1 Illness of a passenger during a journey
- (i) How such a situation would be identified;
- (ii) The procedures to be followed if such a situation occurred, and the role of the fireman in them;
- (iii) Locations of emergency access points;
- (iv) Procedure if a passenger train has to be propelled, and the role of the fireman in it.

#### 3.2 Illness of a member of the train crew during a journey

- (i) The immediate procedures to be followed if such a situation occurred, and the role of the fireman in them;
- (ii) The possibilities and procedures for emergency operation of the train, and the role of the fireman in them.

#### 3.3 Obstruction of the line, or other out-of-course stops by a train

- (i) The immediate procedures to be followed if such a situation occurred, and the role of the fireman in them;
- (ii) The possibilities and procedures for emergency operation of the train, and the role of the fireman in them;
- (iii) The procedure for re-starting a train after such a stop.

#### 3.4 Locomotive or rolling stock failures or accidents

- (i) The immediate procedures to be followed if such a situation occurred, and the role of the fireman in them;
- (ii) The possibilities and procedures for obtaining assistance in such a situation, and the role of the fireman in them;
- (ii) The possibilities and procedures for emergency operation of the train, and the role of the fireman in them.

#### 4. Operation of freight trains or multiple trains.

- 4.1 Normal operation of a freight train
- (i) Knowledge of gradients along the line and associated braking requirements.

# 4.2 Operation of the Moor Road Level Crossing

- (i) Procedures and precautions for trains proceeding downhill, and the role of the fireman in them;
- (ii) Procedures and precautions for trains proceeding uphill, and the role of the fireman in them.

#### 4.3 Operation of the Balm Road Loop Level Crossing

- (i) Procedures for the operation of the gates, and the role of the fireman in them;
- (ii) Precautions for limited clearances;
- (iii) Restrictions on shunting operations over the crossing.

#### 5. After trains have been run.

- 5.1 Disposal of passenger rolling stock
- (i) Requirements for the stabling of passenger stock;
- (ii) Procedures and precautions for shunting passenger coaches to stable them, and the role of the fireman in them.

# 5.2 Disposal of freight rolling stock

- (i) Requirements for the stabling of freight stock;
- (ii) Procedures and precautions for shunting freight vehicles to stable them, and the role of the fireman in them.

# 5.3 Disposal of locomotives

- (i) Requirements for the stabling of locomotives;
- (ii) Procedures and precautions for disposing of locomotives, and the role of the fireman in them;
- (iii) The requirements for recording the operation of locomotives, and aspects which the fireman should report to the driver.