

Key & Alarm Transmitter Guide

LSL483g

Various security alarm systems have been used on Lotus models, but whichever system is fitted, it is most important that the vehicle owner keeps secure records of the transmitter codes and mechanical key codes to allow replacements to be ordered in case of transmitter or key loss. All new cars are provided with two sets of keys and transmitter fobs, with the security codes supplied on tabs, stickers or printed cards. These codes should be recorded by the owner before separating from the keys and keeping safely with the vehicle documents. In the interests of customer service, the codes should also be recorded by the dealer in the client's secure file. The New Vehicle Handover form, a copy of which is retained by the dealer, also has provision to record security codes. This advice also applies to the security wheel nut tool code supplied on a sticker in the toolkit.

With the support of Bolton Lock Company, Lotus is able to provide an expeditious key cutting and transmitter coding service. If the vehicle owner is unable to supply the key number, transmitter code or PIN, and the dealer records are also void, an Archive Search Request may be submitted to Lotus on form **A4-A-5301**, for which a charge of is made. Note that it is the responsibility of the dealer to establish the veracity of the search request (sight of the registration document is recommended) before signing and submitting the form, a copy of which will be retained with the records. Original vehicle build records will be used to supply codes, unless Lotus is informed of any service replacement alarm system codes via notification form LSL518 (replaced by form A4-A-5304).

Associated forms which may be required include:

Lotus Key Cutting/Transmitter Order Form; LSL482d used to order cut keys (and coded transmitters for M100 Elan and Elise S1 prior to October 1997)

Meta Coded Key Order Form; A4-A-5303a (used to order coded Meta transmitters)

Archive Search – Security Codes; A4-A-5301 (used for key and transmitter codes)

Archive Search – Security System Type; A4-A-5302 (used primarily for insurance company purposes)

Notification - Lock/Alarm Replacement; A4-A-5304 (to allow Lotus records to be updated)

A master copy of each of these forms should be kept securely by the Senior Parts Controller. Forms should be copied before completion and faxing.

Security Systems

Lotus Cars has, since the early 90s, used several different types of alarm system due to changing customer requirements and developing technology. Consequently, there are several versions of transmitter fob, all requiring particular ordering procedures, with some needing to be matched to the vehicle on receipt. These systems are described in reverse chronology:

a) **PFK 457:** Elise/Exige models built from introduction of '08 M.Y. and all Evora models, are fitted with a PFK 457 alarm/immobiliser system meeting U.K. Thatcham category 1 requirements. Lotus designed and badged transmitter keys combine a mechanical key blade with a three button transmitter unit incorporated into the key head. Additional or replacement transmitter keys may be purchased in their two component parts (which snap together) under the following part numbers:

Transmitter Fob (key head);

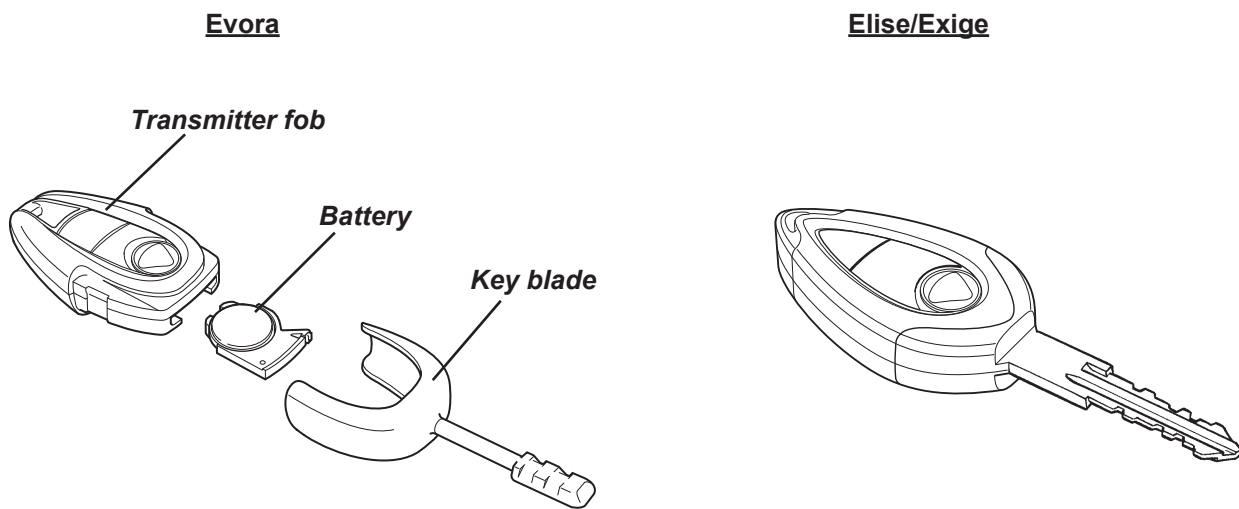
Elise/Exige: A120M0049F; Evora: A132M6099S. These are supplied by Lotus uncoded and need matching to the vehicle using the vehicle owner's 5-digit PIN, as described in the Owner's Handbook and Service Notes electrical section. They will also need a type CR2025 battery.

Uncut Mechanical Key Blade;

Elise/Exige: A120H0008S; Evora: B132H0018S. Supplied by Lotus for copy cutting to existing key blade.

Cut Key Blade;

Elise/Exige: A120H0009S. Evora: A132H0056S. Order only from Bolton Lock Company (form LSL482d) quoting 4-digit 'L' key code (Elise/Exige) or 6-digit 'T' key code (Evora).



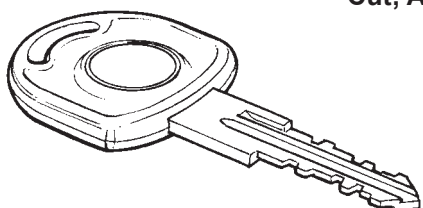
b) **Cobra 8166:** The Europa S and SE are fitted with a Cobra 8166 alarm/immobiliser meeting U.K. Thatcham category 1 requirements. The system is similar to the 8186 (see later) but uses an immobiliser unit surrounding the steering lock barrel to sense automatically the insertion of a valid mechanical key with a security transponder incorporated into the key head. To operate the alarm and CDL, separate teardrop shaped transmitter fobs are used (same as Cobra 8186 and 6422 systems) with one large and one small button. These are purchased from Lotus uncut under part number A111M6100S, and are programmed to the car by the owner using a four digit sPecific Identification Number (PIN) supplied with the alarm. Note that all transmitters to be used must be programmed (or re-programmed) collectively as detailed in the Owner's Handbook and Service Notes section MQ.

The mechanical key may be ordered uncut from Lotus for copy cutting, under part number A124H6000F. Alternatively, a cut key can be ordered from Bolton Lock under A124H6001S using form LSL482d and supplying the key code. In either case, the immobiliser on the car must then be taught to recognise the transponder in the key head using the Lotus Scan 3 tool:

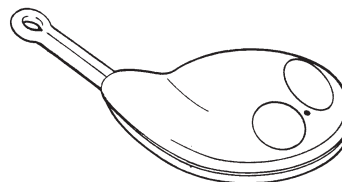
- With the new key in the ignition, work through the following Scan 3 menu options;
- *Lotus Vehicle*
- *Europa S*
- *Immobiliser*
- *Turn on ignition*
- *Advanced Options*
- *Secret Key/Fixcode* This is the mechanical key 4-digit numerical code

This procedure must be repeated for each new key.

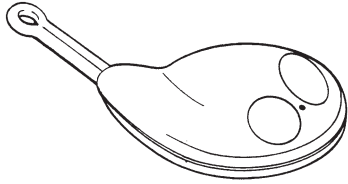
**Mechanical key with transponder: Uncut; A124H6000F (Lotus)
Cut; A124H6001S (Bolton)**



Transmitter fob; A111M6100S (Lotus)



c) **Cobra 8185/8186:** Elise/Exige models built from approx. March '02 until end of '07 M.Y., are fitted with a Cobra 8185 engine electronic immobiliser meeting U.K. Thatcham category 2 requirements, but most cars were specified with the upgraded Cobra 8186 including cockpit intrusion sensing and a self powered siren and meeting U.K. Thatcham category 1 requirements. Both versions use teardrop shaped transmitter fobs (same as used with Cobra 6422) with one large and one small button. Replacement transmitter fobs are purchased from Lotus uncoded under part number A111M6100S, and are programmed to the car by the owner using a four digit sPecific Identification Number (PIN) supplied with the alarm. Note that all transmitters to be used must be programmed collectively as detailed in Service Notes section MO.1a ('01MY onwards) or MP.1 ('04MY onwards).



Cobra transmitter fob A111M6100S; Order from Lotus

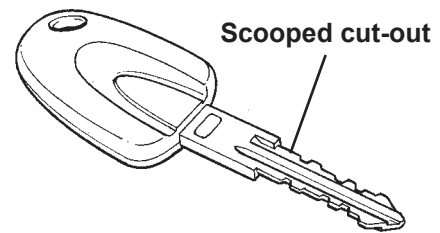
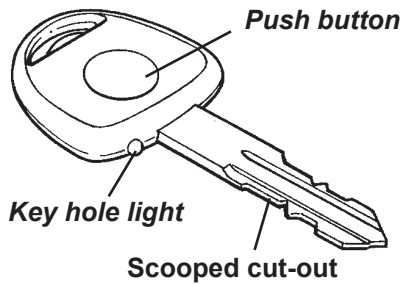
Two types of mechanical key have been used. Prior to April 2005*, the key blade used a 'D' prefix code and the key head incorporated a pushbutton operated keyhole lamp. Later cars use a different key blank with an 'L' prefix code and have no key hole lamp in the differently shaped head. Both types of key may be ordered as blanks from Lotus for copy cutting, or cut to code number from Bolton Lock.

(*approx. change point VIN '05 M.Y. from serial no: Elise; 3437. Exige; 3347. USA Elise; 3436).

Note: Key Blades 'D' code and 'L' code do not match the scooped cut-outs are on opposite sides

'D' code key with lamp:
 Uncut; A117H0022F (Lotus)
 Cut; A117H0022S (Bolton)

'L' code key without lamp:
 Uncut; A120H6002S (Lotus)
 Cut; A120H6002C (Bolton)



d) **Meta:** 'Mk.2' Elise prior to Feb. '02 and all 340R and 'Mk.1' Exige models, use a Meta vehicle security system, being either an M36 T2 electronic immobiliser meeting U.K. Thatcham category 2 requirements, or, as an optional upgrade, a full M99 T2 alarm system incorporating M23 cockpit intrusion sensing and a self powered siren, which meets Thatcham 1.

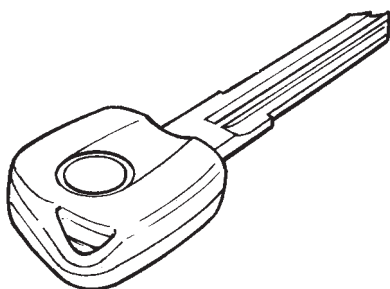
The original transmitter fob with a single button incorporated into the head of the mechanical door key is no longer available. Replacement transmitter fobs (part number A340M6041S) may be ordered using form A4-A-5303a and A4-A-5301 if required (both forms available on the Lotus Dealer Portal).

The order form also requires coding zone information. Each Meta controller has 7 coding zones to which transmitters may be assigned, and can be used only once. Positions 1 and 2 are used for the original equipment transmitters. Service replacement transmitters must be assigned to unused zones, so it is essential that this zoning information is recorded, and supplied when ordering any further transmitters. Coding a replacement key to an already used zone will result in an inoperative transmitter.

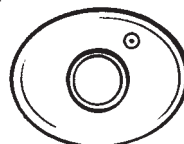
On receipt of a new coded transmitter, a button press sequence must be carried out at the car to match the new key to the controller. This procedure is detailed in Service Notes section MO.1. Note however, that this requires the use of an existing working transmitter. If both transmitters are lost or damaged, the alarm system must be replaced.

In the event that a customer requires a replacement key then either order an uncut key from the Aftersales Department (part number A117H0022F) or a cut key using Bolton Lock form LSL482d quoting 'D' code cut key part number

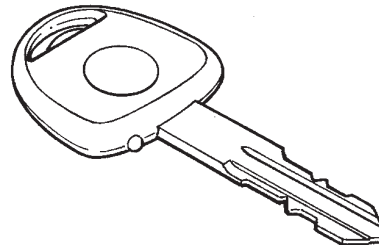
**Original Key/Transmitter Fob
No Longer Available**



Service Replacement Fob A340M6041S



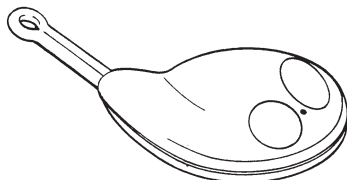
**'D' code key with lamp;
Lotus A117H0022F (blank)**



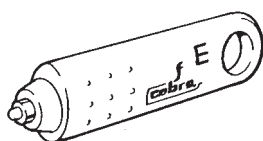
e) **Cobra 6422:** 'Mk.1' Elise from October 1997 with optional security upgrade were fitted with a Cobra 6422 system (also '98 onwards Esprit) meeting Thatcham Category 1 requirements. Teardrop shaped transmitter fobs (same as used with Cobra 8185/8186) have one large and one small button, and are purchased from Lotus uncoded under part number A111M6100S. New transmitters are programmed to the car using the vehicle owner's separate Cobra touch key and a procedure detailed in Service Notes section MN.12.(Elise) and ML.15 (Esprit)

Replacement uncoded touch keys may be ordered under part number A111M6101S, but can be programmed using only a Cobra 'Jolly 2' tool (available from Cobra) and only when the alarm is disarmed and mobilised. If both transmitter keys and the touch key are lost or damaged, the complete system must be replaced.

Replacement mechanical cut keys may be ordered from Bolton Lock as 'CUTKEY' and quoting the code number.



A111M6100S; Order from Lotus



A111M6101S; Order from Lotus

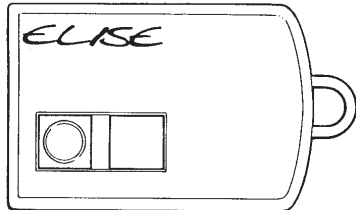


f) **Cobra 6019HF:** Optional upgrade on 'Mk.1' Elise prior to October 1997 was a Cobra Goldline 6019HF, which meets Thatcham Category 1 requirements. The rectangular transmitter fob has a red and a blue button.

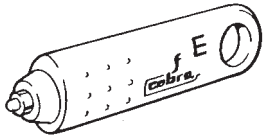
Replacement coded transmitters may be ordered under part number A111M6038S from Bolton Lock quoting the 9 digit security code which has a suffix of 'G'. No further matching is required.

Replacement coded touch keys may also be ordered under part number A111M6039S from Bolton Lock quoting the security code which is prefixed with 'N' followed by 7 digits.

Replacement mechanical cut keys may be ordered from Bolton Lock as 'CUTKEY' and quoting the code number.



A111M6038S; Order from Bolton Lock



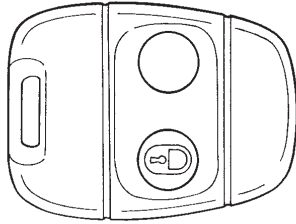
A111M6039S; Order from Bolton Lock



g) **Lucas 5AS:** 'Mk.1' 1996 to 2000 model year Elise were fitted as standard with a Lucas 5AS security module which is electronically coded to the engine management ECU. The trapezoidal transmitter fob has two buttons, one smooth and one embossed with a padlock symbol. If the transmitter fails to respond: Press the 'lock' button 4 times in rapid succession to re-synchronise. If this fails, remove the transmitter battery, press both buttons simultaneously for 5 seconds to dispel any residual charge, refit battery, stand close to the car (module) and press lock button rapidly 4 times.

Replacement transmitters are uniquely coded and may be ordered from Lotus under part number A111M6063S. The 5AS module must then be taught to recognise all transmitters to be used using the Lotus Scan 3 tool.

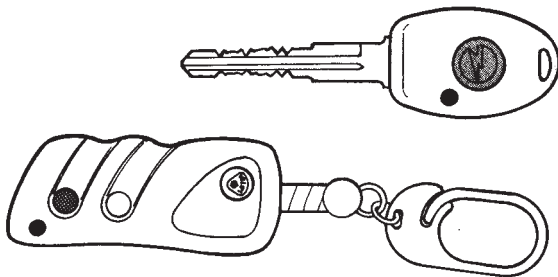
Replacement mechanical cut keys may be ordered from Bolton Lock as 'CUTKEY' and quoting the code number.



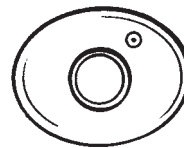
A111M6063S; Order from Lotus

h) **Gemini Aquila 5160T:** S2 Type M100 Elan, '94 - '95 M.Y. were fitted as standard with a Gemini Aquila 5160T system. One transmitter was incorporated into the mechanical key head, and one stand alone transmitter fob was supplied. Bolton Lock are able to supply a new type stand alone coded transmitter fob under part number A100M6236S if furnished with the 10 digit electronic code. A mechanical cut key can also be supplied (if advised of the key code) By Bolton Lock under part number CUTKEY.

Original keys (no longer available)



Replacement keys



**A100M6236S;
Order from Bolton Lock**



**CUTKEY
Order from Bolton Lock**

i) **Gemini 4002 with 1059 Microwave Sensor:** S1 Type M100 Elan '90 - '92 were not available with factory fitted alarms. A Lotus approved Gemini system was dealer fitted to many cars, but the factory holds no records of security codes. If the code is known, transmitter fobs may be ordered from Bolton Lock under A100M6238S.

Updated 15/09/2011