

Resistance to the Transmission of Sound

A Homebuilder's Perspective

- 1) Introduction.
- 2) Our approach to the Transmission of Sound to date.
- 3) Overview of upcoming changes to Technical Standards in 2010.

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A Homebuilder's Perspective

INTRODUCTION

- We represent the Technical Team in CALA Homes (East) Ltd.
- We are Part of CALA Scotland which is split into 3 regions west, east & north.
- We Build approximately 500 homes a year, turnover approx £2m a year over the 3 regions.

OUR APPROACH TO THE TRANSMISSION OF SOUND TO DATE

- Customer based feedback was the driver for change of approach coupled with a move in to more bespoke housing, particularly apartments & refurb.
- We chose to adopt the Robust Details as a standard even though it was not recognised as a system in Scotland, in anticipation that it would eventually be adopted by SBSA.
- We pay for the subscription to the RD handbook but obviously in Scotland there is no vehicle for registering individual plots with the RD verification process.
- We encourage our Site Managers however to still use the RD Check Lists as good practice.
- We have also adopted a policy of testing completed property “types” irrespective of what Building Control are looking for as a means to educate ourselves on the buildings we are constructing.

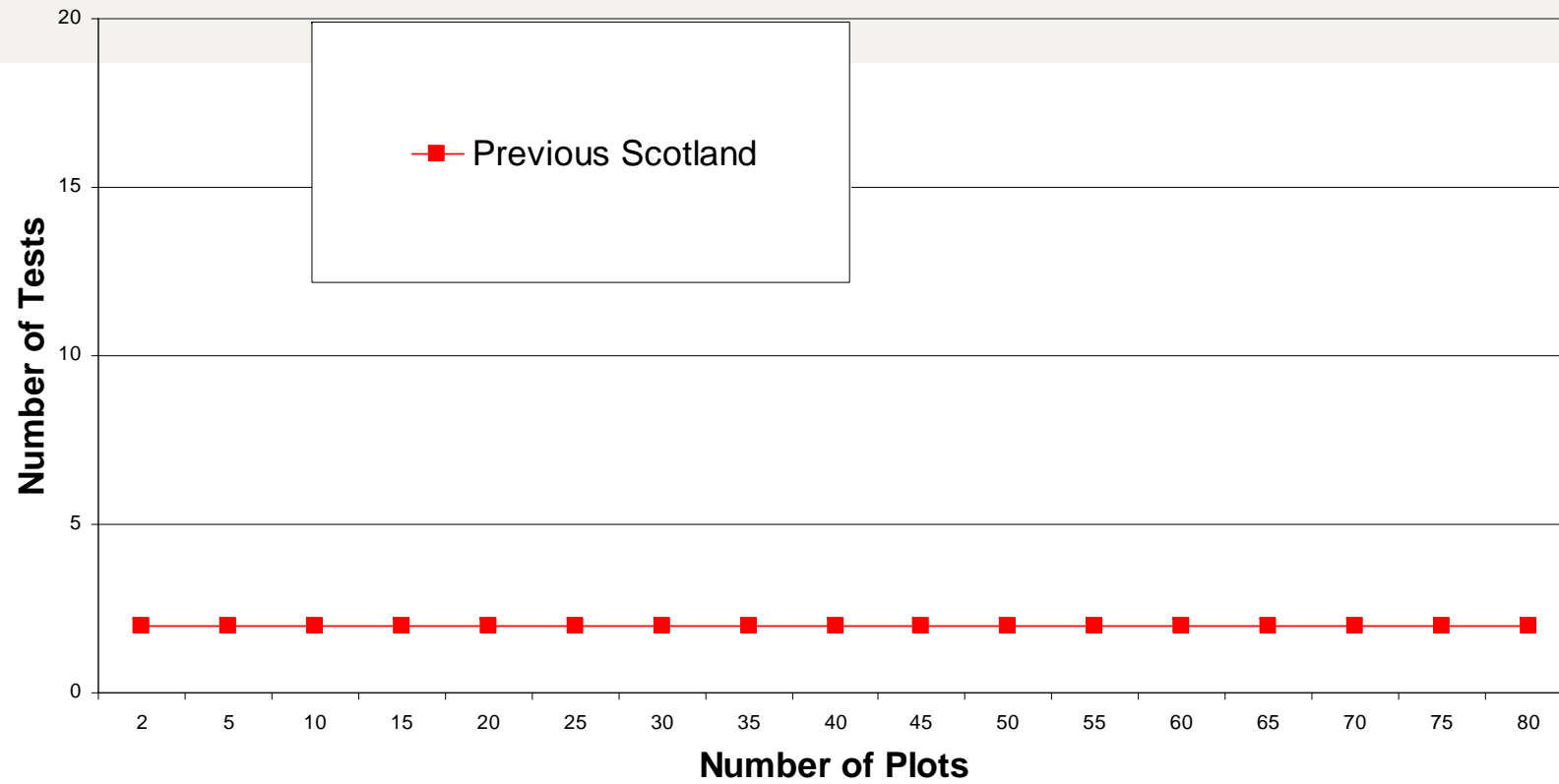
OUR APPROACH TO THE TRANSMISSION OF SOUND TO DATE

- We have constructed apartments in various constructions, timber kit, metsec, traditional blockwork – in most cases we have achieved first class test results.
- We have successfully completed complex refurb projects with again very good test results. We have achieved this through incorporating an extensive consultation with RMP into our design stages.
- Our increasing library of completed test results are serving us in both gaining LA technical approvals for new developments and in addressing the concerns of our customers.
- In summary: by choosing to address this subject as an issue of build quality and an area where customer satisfaction is important we have adopted an approach which goes beyond “design to the minimum”. This hopefully makes us future proof as the standards in Scotland begin to get raised to the level they should be.

Proposed introduction of PCT (Post Construction Testing)

- PRESENT: Already requested by some local authorities in Scotland
- PROPOSED: But now applicable all over Scotland –
- *this raises cost issues for new build and conversion sites for rural and island areas*
- PRESENT: LA's typically ask for 2 tests (possible 4)
- PROPOSED: Now testing ratio table provided for **new build** (example and alternative constructions) and **conversions**
- *will considerably change the landscape of costs, number of tests and repeat visits by testers to sites.*

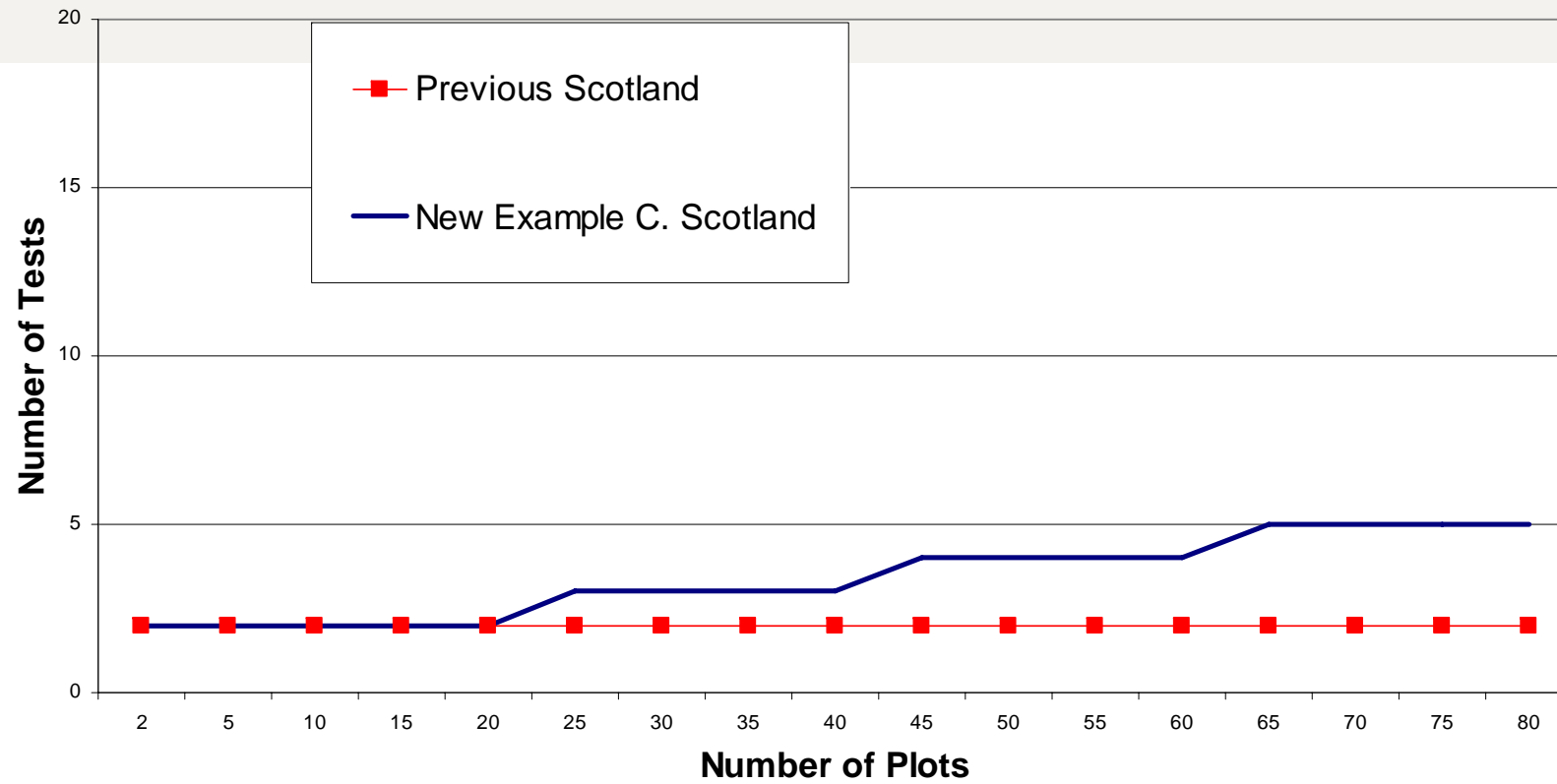
PCT - Comparing Previous Section 5 with New Section 5



WE CARE ABOUT THE THINGS YOU CARE ABOUT



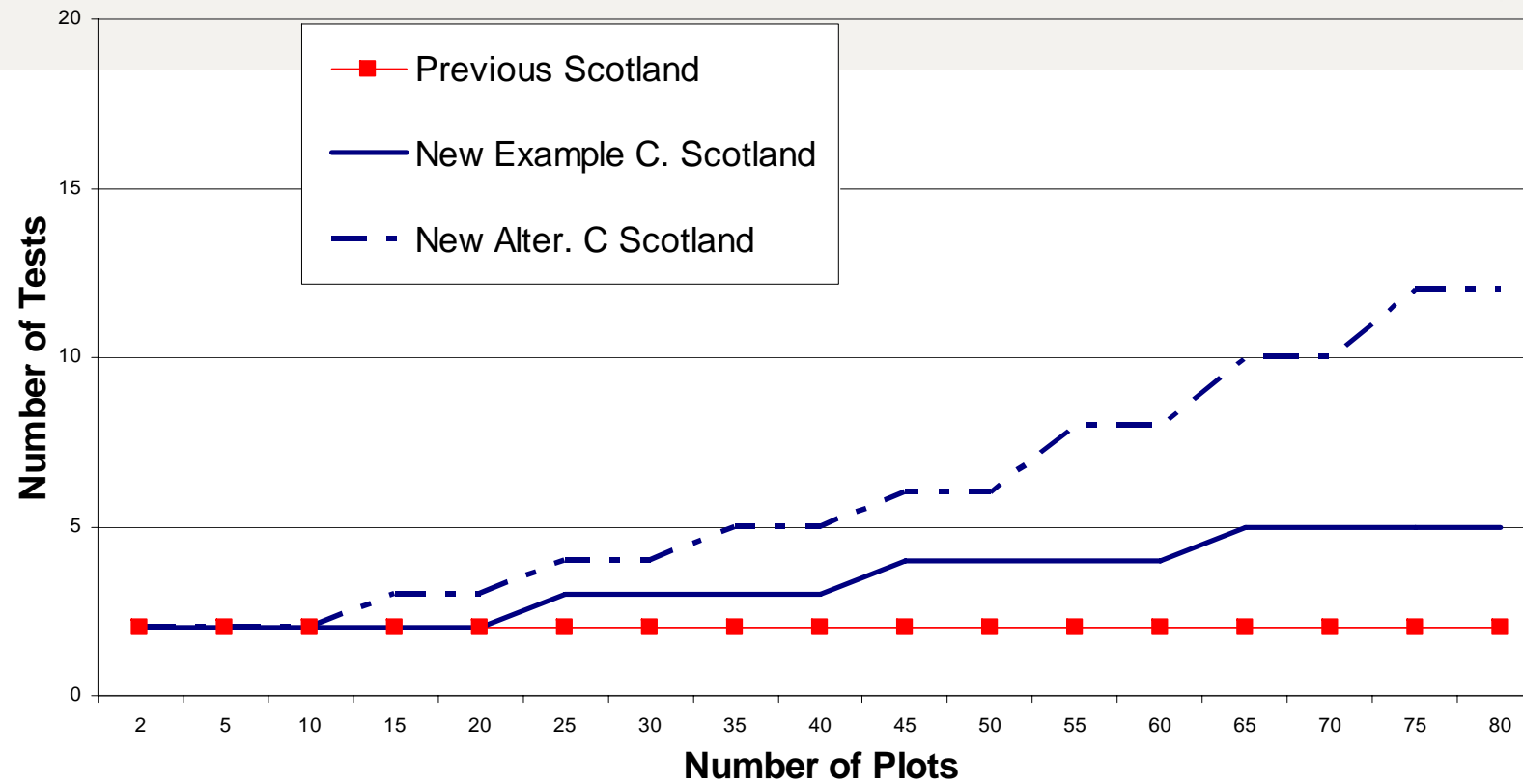
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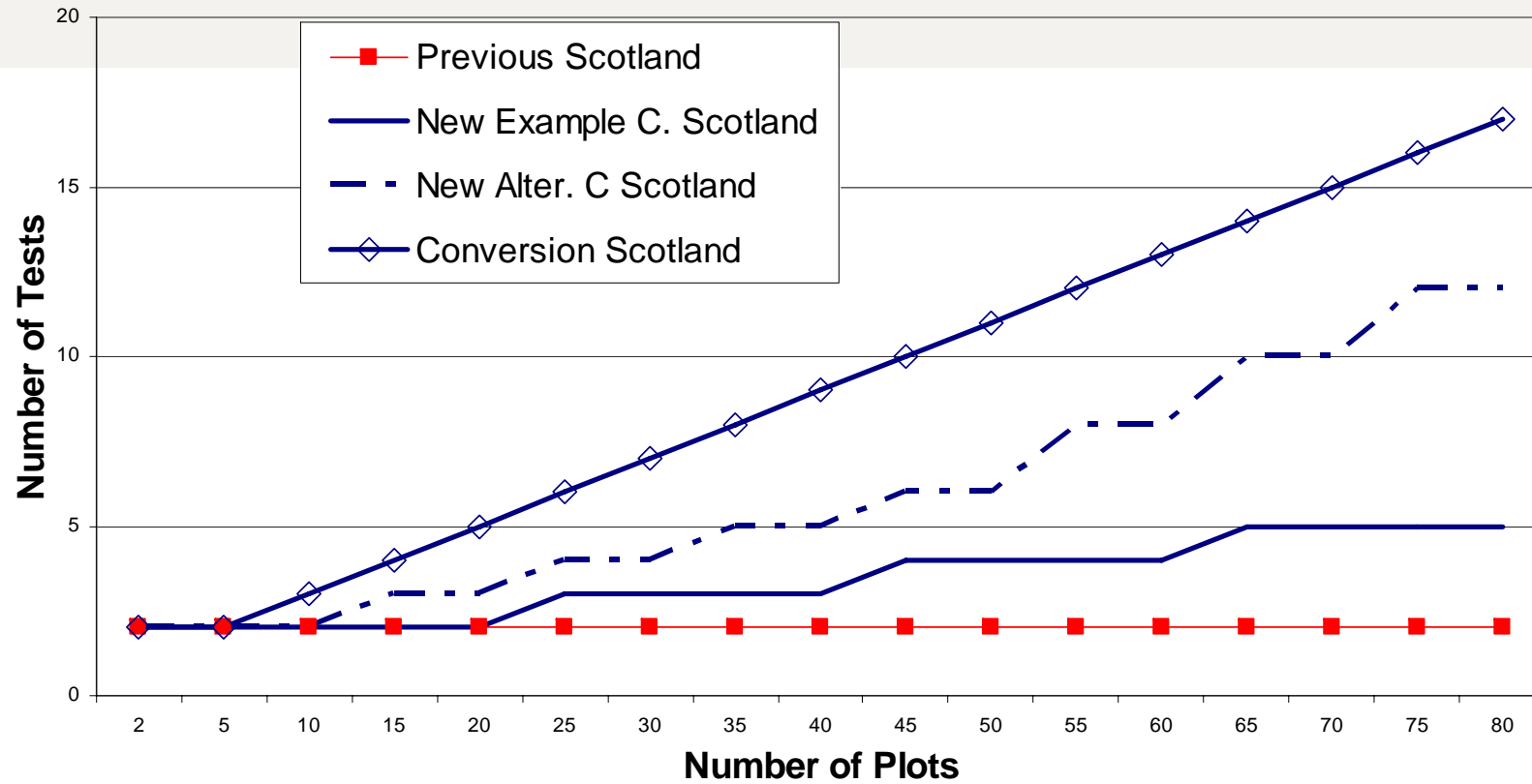
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Introduction of New Design and Performance Levels

- PRESENT: Target mean values (allowing 4 dB variation below mean)
- PROPOSED: Now absolute minimum and maximum of 56 dB
- *Specifiers and site managers will have to follow the design specifications and ensure robust build and works*
- *Little movement for error*
- *May lead to over engineering to safeguard compliance*

Introduction of New Guidance Structures

- PRESENT: Wall render coats and ceiling resilient bars already present
- PROPOSED: wider cavities, deeper floors (particularly precast concrete)
- *Very similar to Robust Details*
- *But No checklists*
- *Lack of future thermal insulation factors*

Introduction of Internal Walls and Floors

- PRESENT: No performance levels other than warranty providers requirements
- PROPOSED: Min. 43 dB Lab based or guidance structures with Higher value than E&W (Min. 40 dB)
- *Wall thickness increase and materials*
- *Longer periods for fitting out*
- *Potential significant increase in costs*

Areas of Cost Increase (£ million)

