

Westinghouse Non-Proprietary Class 3

WCAP-17590-NP  
Revision 0

September 2012

# **Peach Bottom Units 2 & 3 Replacement Steam Dryer Acoustic Load Definition**

Enclosure B.1



**WCAP-17590-NP**  
**Revision 0**

# **Peach Bottom Units 2 & 3 Replacement Steam Dryer Acoustic Load Definition**

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**September 2012**

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\*Electronically approved records are authenticated in the electronic document management system.

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**LIST OF ACRONYMS/ABBREVIATIONS**

<b>Acronym</b>	<b>Definition</b>
3-D	three-dimensional
ACM	acoustic circuit model
CLTP	current licensed thermal power
EPU	extended power uprate
FIV	flow-induced vibration
MSL	main steam line
PBAPS	Peach Bottom Atomic Power Station
PSD	power spectral density
RMS	root mean square
RPV	reactor pressure vessel
RSD	replacement steam dryer
SNR	signal-to-noise ratio
SRSS	square root of the sum of the squares
SRV	safety relief valve
SSV	spring safety valve

# 1 EXECUTIVE SUMMARY

The qualification [ 3 replacement steam dryer design requires [ structure. [

]° of the Peach Bottom Units 2 & ]° analysis of the alternating stresses acting on the

]°<sup>a,b,c</sup>

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## 2 [ DRYER

## ] <sup>a,c</sup> THE REPLACEMENT STEAM

In order to qualify the Peach Bottom Atomic Power Station (PBAPS) Units 2 & 3 replacement steam dryer design for acoustic pressure loads originating from flow-induced vibration (FIV) phenomena, it is necessary to define [

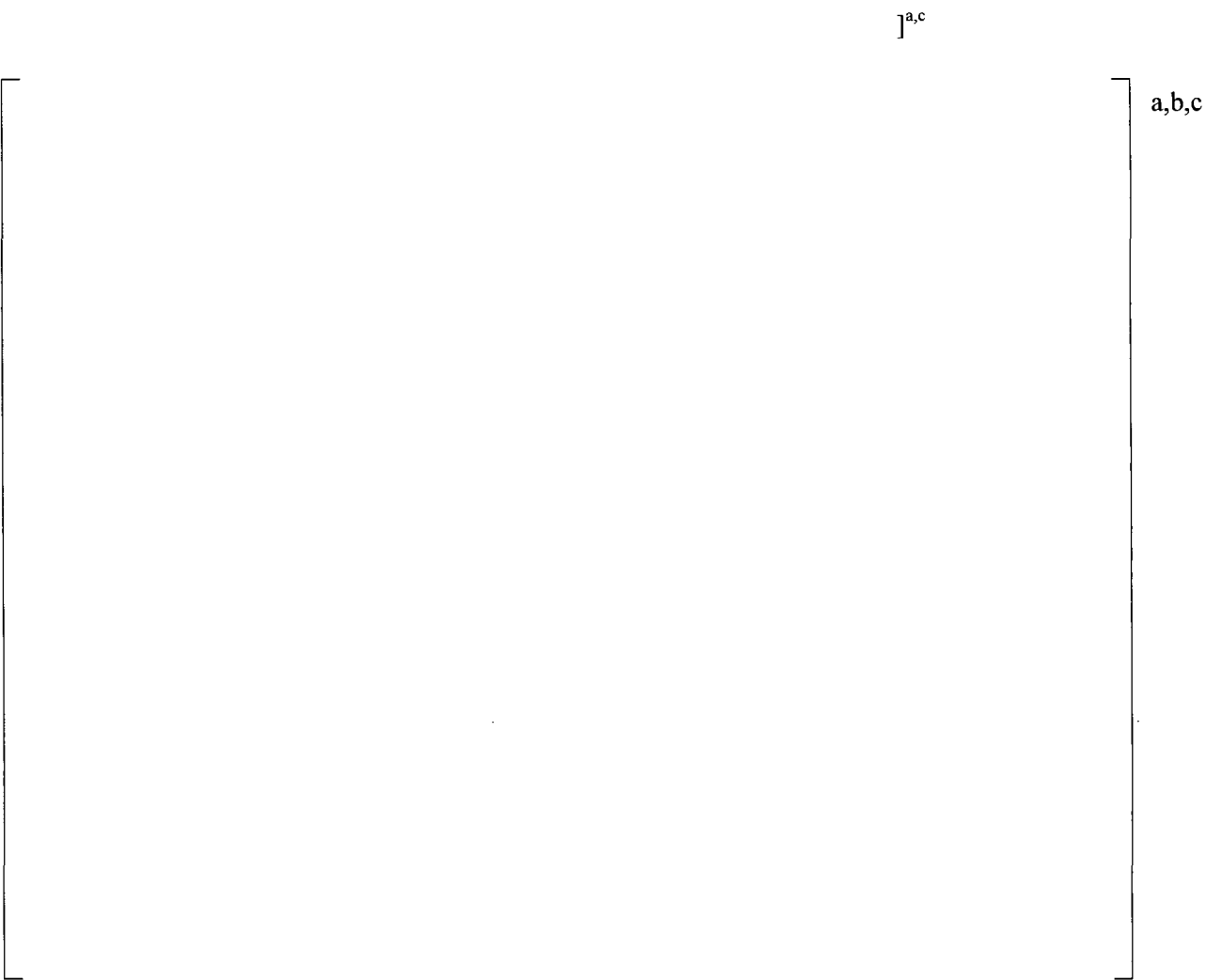
] <sup>a,c</sup>

2.1 [

] <sup>a,c</sup>

[





] <sup>a,c</sup>

a,b,c

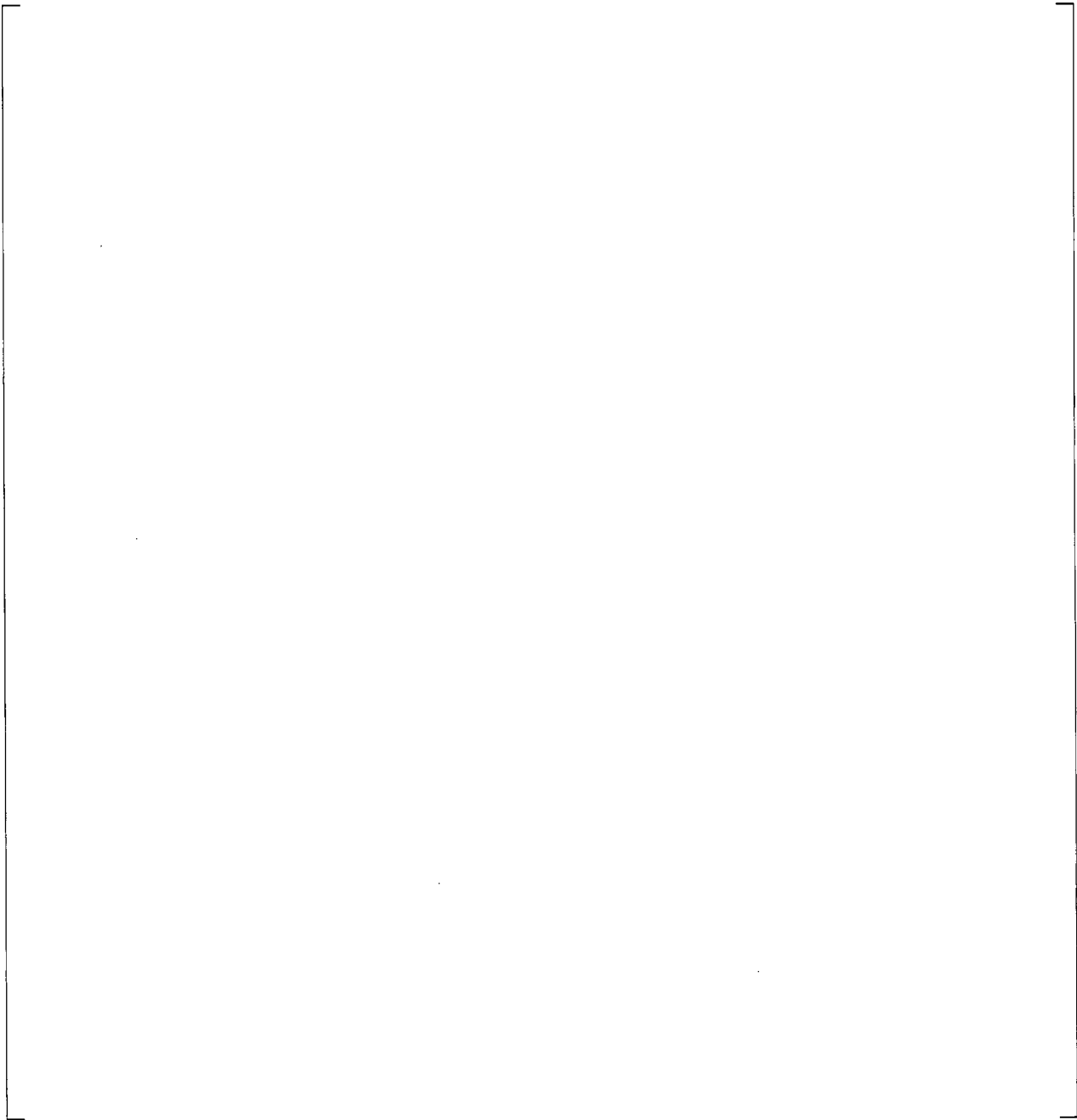
**Figure 2-1** [

] <sup>a,c</sup>



**Figure 2-2a** [

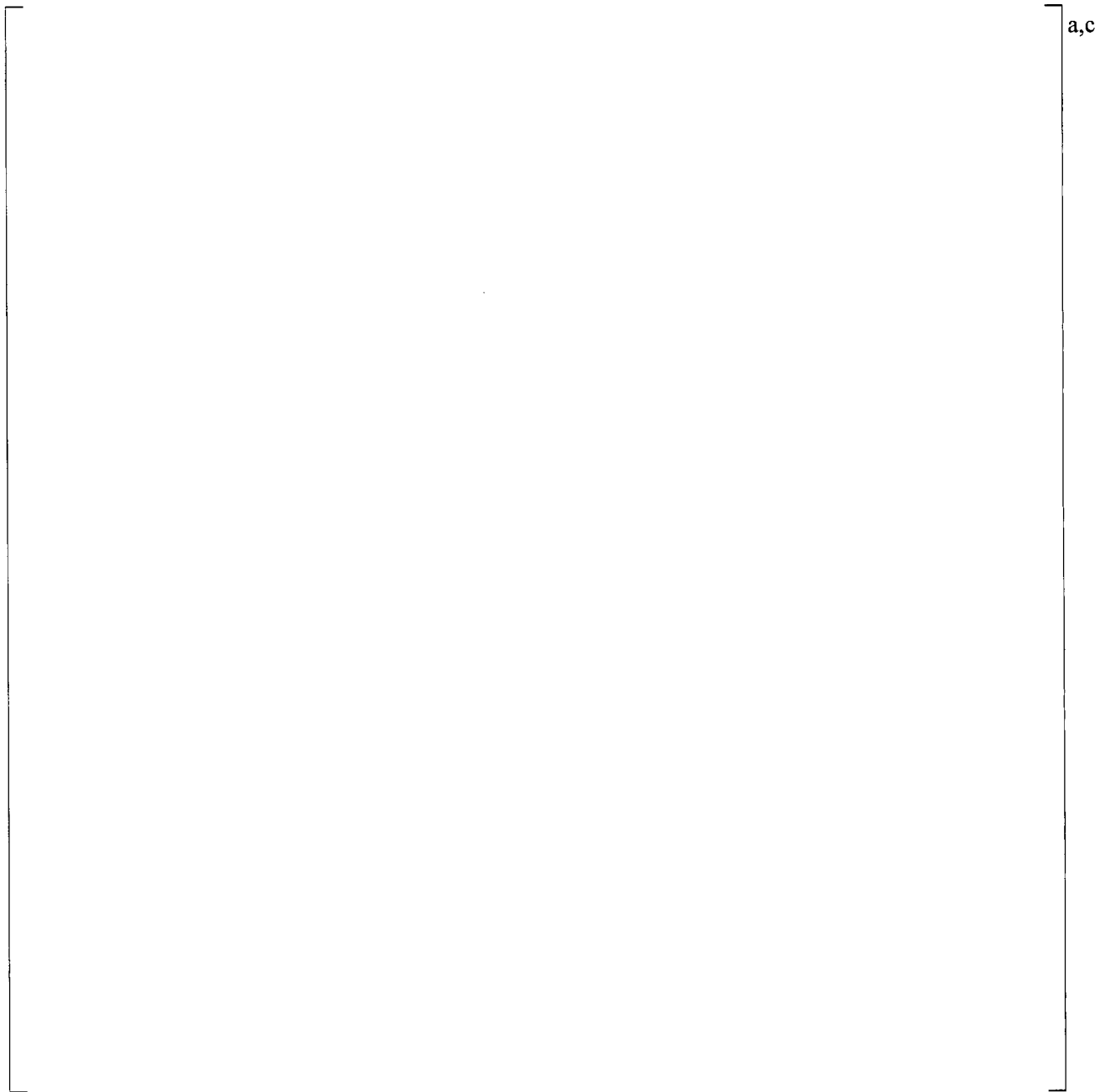
]<sup>a,c</sup>



a,c

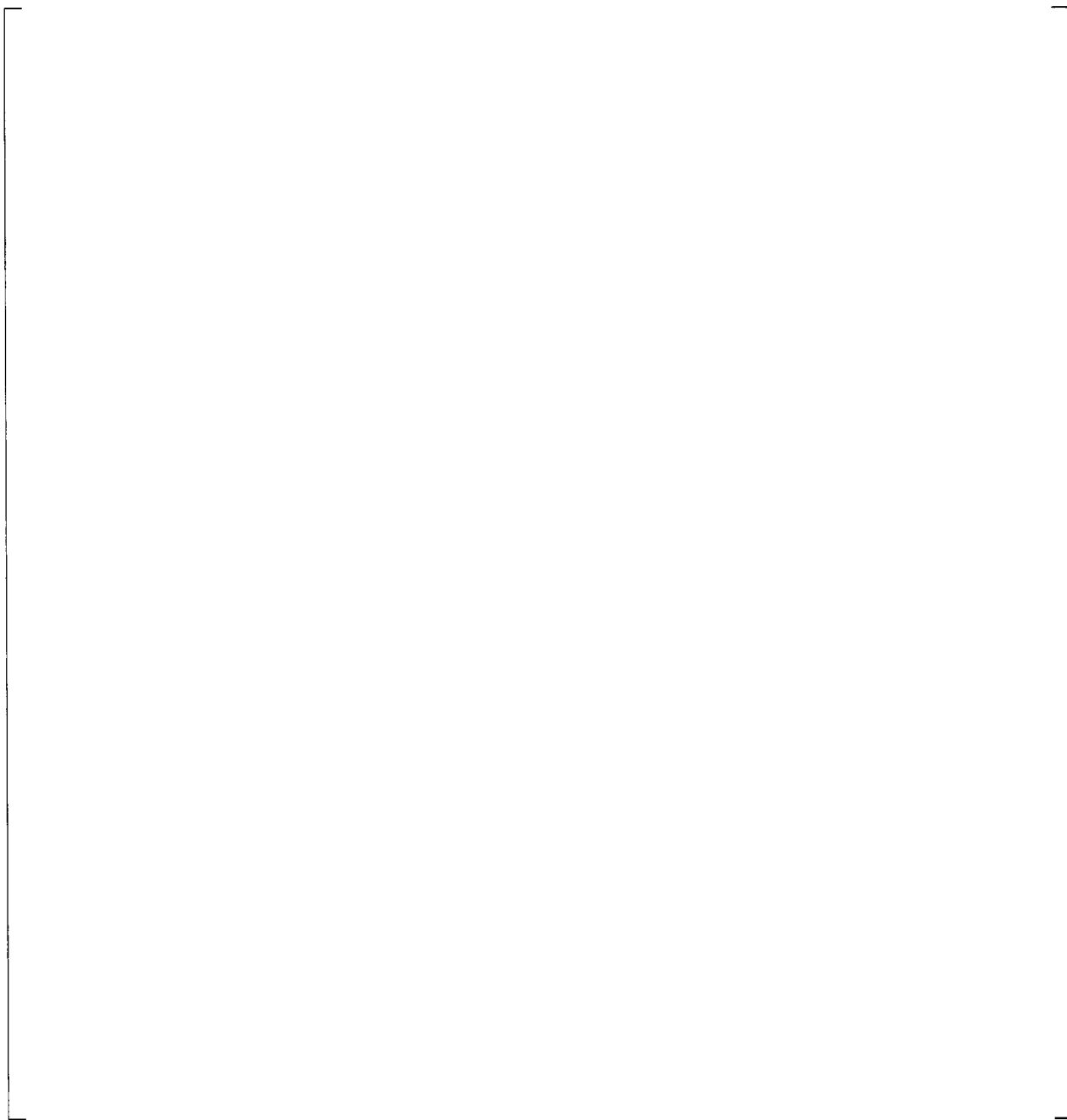
**Figure 2-2b** [

] a,c



**Figure 2-2c** [

] <sup>a,c</sup>



a,c

**Figure 2-3a** [

] a,c



**Figure 2-3b [**

**]**<sup>a,c</sup>

2.2 [

] <sup>a,c</sup>

[

] <sup>a,c</sup>

[

] <sup>a,c</sup>

[

] <sup>a,c</sup>

[

] <sup>a,c</sup>

Figure 2-4 [

] <sup>a,c</sup>

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] <sup>a,c</sup>

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] <sup>a,c</sup>

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] <sup>a,c</sup>

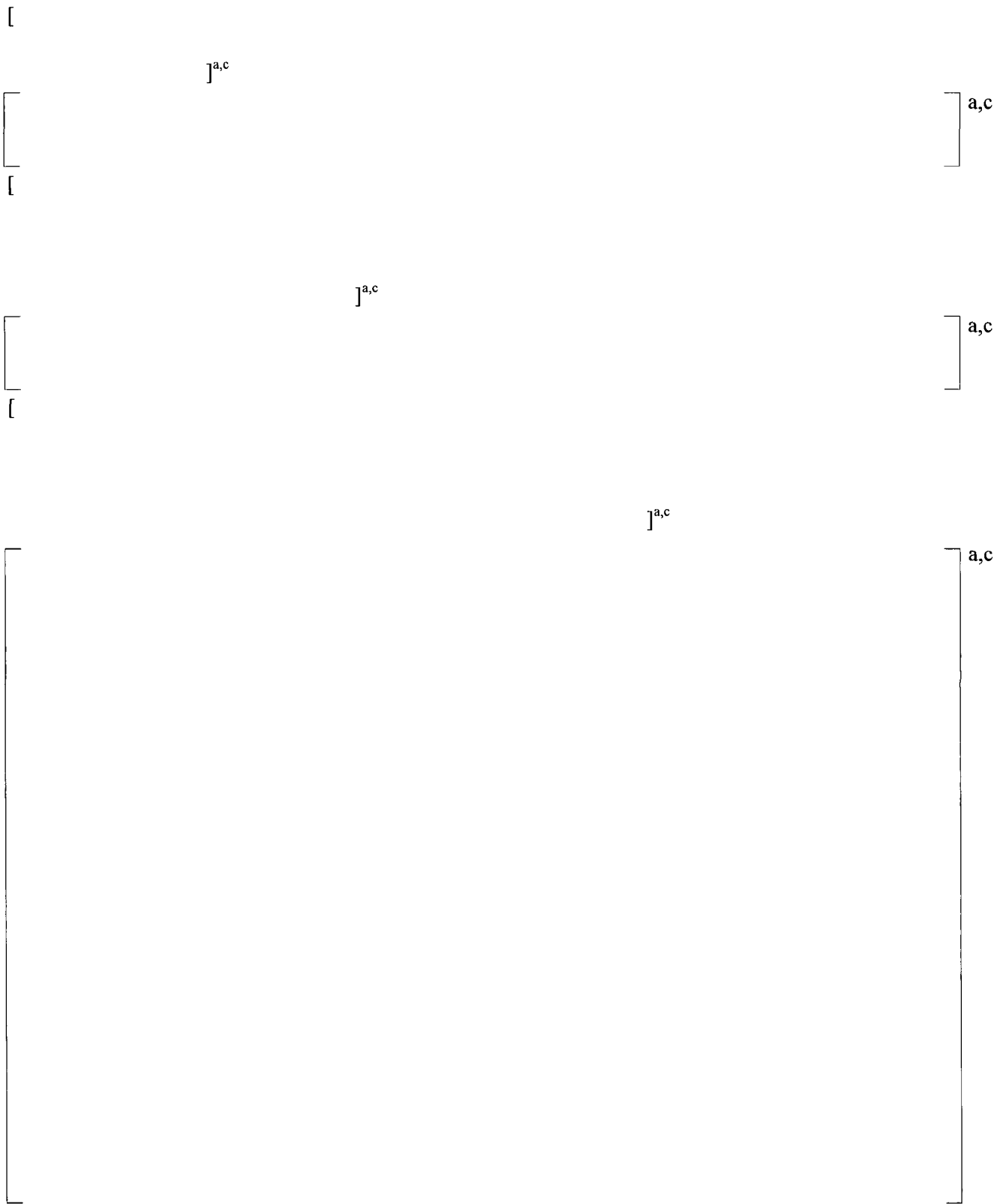


Figure 2-5 [

]a,c



[

] <sup>a,c</sup>

3 [

] <sup>a,c</sup>

[

] <sup>a,b,c</sup>



a,c

Figure 3-1 [

] <sup>a,c</sup>

[

] <sup>a,c</sup>

[

] a,c

[

] a,c

[

] <sup>a,c</sup>

[

] a,c

[

] <sup>a,c</sup>

[ ] a,c

[

]a,c

[ ] a,c

[

]a,c

3.1 [

]a,c

[

]a,c

Table 3-1

] <sup>a,c</sup>

a,b,c




Table 3-3				<sup>a,b,c</sup>	

a,b,c

Table 3-4				<sup>a,c</sup>	

a,b,c

3.3 [ ]<sup>a,c</sup>

[

]<sup>a,c</sup>

[

] a,c

[

] <sup>a,c</sup>

[

] a,c

[



] <sup>a,b,c</sup>

Table 3-5					] <sup>a,c</sup>	



**Figure 3-2 [**

**] a,b,c**



a,b,c

**Figure 3-3 [**

**]**a,b,c



**Figure 3-4 [**

**] a,b,c**



a,b,c

**Figure 3-5 [**

**] a,b,c**

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