AluI

SPEED DIGEST 37°C L or K 65°C, 20min

5’…AG▼CT…3’
3’…CT▲GA…5’

AluI is a restriction enzyme purified from Arthrobacter luteus (ATCC 21606)

Catalogue No 101-1, 1000 U
101-2, 3x1000 U

Concentration 10-12u/μl and 40-60u/μl*
*Add an H to cat.# to order the high concentration

Reagents supplied: 10x L and 10x K buffer

Unit substrate: Lambda DNA.

Unit calculation assay conditions: 10 mM Tris-HCl (pH 7.9 @ 25°C), 10 mM MgCl₂, 1 mM dithiothreitol, 100 μg/ml bovine serum albumin and DNA. Incubate at 37°C.

Absence of contaminants: 50 units of AluI do not produce any unspecific cleavage products after 16 hrs incubation with 1 μg of lambda DNA at 37°C. After 10-fold overdigestion with AluI, greater than 95% of the DNA fragments can be ligated and recut with this enzyme.

Storage buffer: 100 mM KCl, 10 mM Tris-HCl (pH 7.4), 0.1 mM EDTA, 1 mM dithiothreitol, 200 μg/ml bovine serum albumin and 50% glycerol. Store at -20°C.

Heat inactivation: 65°C for 20 minutes.

Methylation Sensitivity:
dam methylation: Not sensitive
dcm methylation: Not sensitive
CpG methylation: Not sensitive

Percent Activity in MINOTECH Buffers

<table>
<thead>
<tr>
<th></th>
<th>L</th>
<th>M</th>
<th>H</th>
<th>SH</th>
<th>A</th>
<th>K</th>
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<td>100</td>
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<td>75</td>
<td>10-25</td>
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General reaction mixture:

10U AluI 1μl
10x L or K buffer * 2μl
DNA substrate <1μg
Sterile ultrapure water Up to 20 μl

Incubate for 15 min at 37°C

*In the case of L buffer we recommend the addition of BSA to a final concentration of 100 μg/ml.

Frequency of Cutting

<table>
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<tr>
<th>λ</th>
<th>Ad-2</th>
<th>Φx174</th>
<th>pUC18</th>
<th>M13mp18</th>
<th>pBR322</th>
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<tr>
<td>143</td>
<td>158</td>
<td>24</td>
<td>16</td>
<td>27</td>
<td>17</td>
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Lambda DNA 1.4% agarose