

## pNFκB-TA-luc (报告基因质粒)

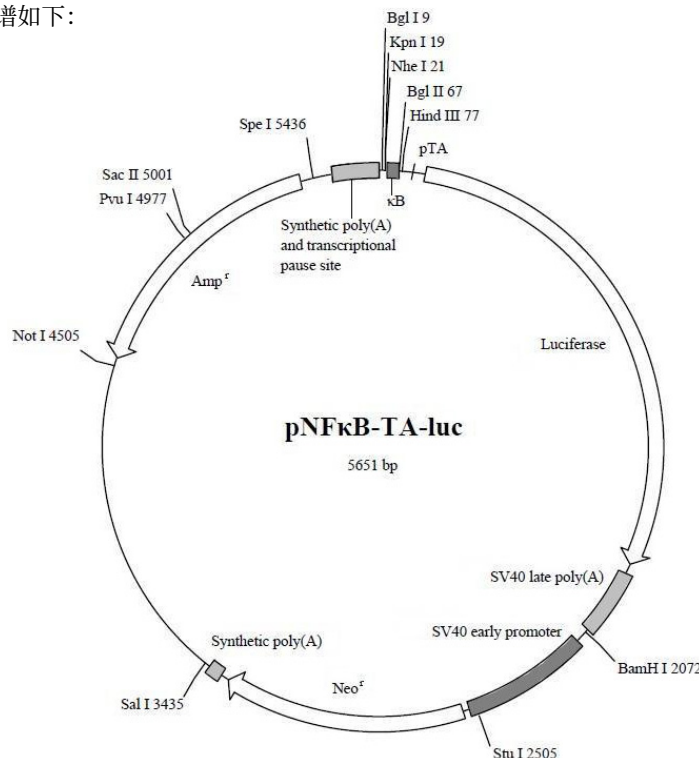
产品编号	产品名称	包装
D2207-1μg	pNFκB-TA-luc (报告基因质粒)	1μg
D2207-100μg	pNFκB-TA-luc (报告基因质粒)	100μg

### 产品简介：

- pNFκB-TA-luc (报告基因质粒)是碧云天自行研发的用于检测NFκB转录活性水平的报告基因质粒。pNFκB-TA-luc是以碧云天的pGL6-TA质粒为模板，在其多克隆位点插入了多个NFκB结合位点，可以高灵敏度地检测NFκB的激活水平。
- pGL6-TA质粒是用于在哺乳动物细胞中进行萤火虫萤光素酶(firefly luciferase)报告基因检测的新一代质粒。该报告基因质粒比Promega公司的pGL3系列有了全面的改进，一方面对于luciferase的编码进行了改进，确保能更好地在哺乳动物细胞中进行表达，同时对整个质粒中所有的可以被预测出的可能的转录因子结合位点全部进行了适当的突变处理，在保持原有功能不变的情况下，使各种转录因子在质粒上的非特异性结合降到最低。
- 萤光素、萤光素酶、萤火虫萤光素酶和海肾萤光素酶也经常被称为荧光素、荧光素酶、萤火虫荧光素酶和海肾荧光素酶。
- pNFκB-TA-luc质粒的主要信息如下：

Base pairs	5651
NFκB response element (κB)	26-65
Minimal TA promoter (pTA)	88-110
luc2 reporter gene	152-1804
SV40 late poly(A) signal	1839-2060
SV40 early enhancer/promoter	2108-2526
Synthetic neomycin phosphotransferase (Neo <sup>r</sup> ) coding region	2551-3345
Synthetic poly(A) signal	3370-3418
Reporter Vector primer 4 (RVprimer4) binding region	3485-3504
ColE1-derived plasmid replication origin	3742
Synthetic Beta-lactamase (Amp <sup>r</sup> ) coding region	4533-5393
Synthetic poly(A) signal/transcriptional pause site	5498-5651
Reporter Vector primer 3 (RVprimer3) binding region	5600-5619

- pNFκB-TA-luc质粒的图谱如下：



➤ pNFκB-TA-luc的多克隆位点及NFκB response element的详细图谱如下:

```

      BglI      KpnI   NheI      NFκB response element
1  GGCCTAACTG GCCGGTACCG CTAGCGGGAA TTTCCGGGAA TTTCCGGGAA
   CCGGATTGAC CGGCCATGGC GATCGCCCTT AAAGGCCCTT AAAGGCCCTT
  
```

```

                BglIII      HindIII      Minimal TA promoter
51 TTTCCGGGAA TTTCCAGATC TGCAGAAGCT TAGACACTAG AGGGTATATA
   AAAGGCCCTT AAAGGTCTAG ACGTCTTCGA ATCTGTGATC TCCCATATAT
  
```

➤ pNFκB-TA-luc中没有的酶切位点(Restriction enzymes that do not cut pNFκB-TA-luc)包括:

```

Aat II   Afl II   Asc I   Ase I   Bsa I   BsaA I   BsiW I   BspM II
BssH II  Eco72 I  EcoR I  EcoR V  Mlu I   Nde I   Nru I   PaeR7 I
PflM I   Pme I    Pml I   Psp1406 I PspA I  Rsr II  Sac I   Sma I
SnaB I   Spl I    Srf I   Tth111 I Vsp I   Xcm I   Xho I   Xma I
  
```

➤ pNFκB-TA-luc中的单酶切位点(Restriction enzymes that cut pNFκB-TA-luc once)包括:

```

Sfi I      GGCCN,NNN`NGGCC 9          BstB I      TT`CG,AA          3421
Bgl I      GCCN,NNN`NGGC 9          Sal I       G`TCGA,C          3435
Acc65 I    G`GTAC,C          15          Afl III     A`CRYG,T          3685
Asp718     G`GTAC,C          15          ApaL I      G`TGCA,C          3999
Kpn I      G,GTAC`C          19          HgiE II    ACCNNNNNNGGT -1/134264
Nhe I      G`CTAG,C          21          Not I      GC`GGCC,GC        4505
Bgl II     A`GATC,T          67          BstX I     CCAN,NNNN`NTGG   4529
Hind III   A`AGCT,T          77          BstE II    G`GTNAC,C         4532
BsrG I     T`GTAC,A          643         Ahd I      GACNN,N`NNGTC    4607
Dra III    CAC,NNN`GTG      1299        Bsu36 I    CC`TNA,GG         4963
Gsu I      CTGGAG 21/19     1532        Pvu I      CG,AT`CG          4977
Bpm I      CTGGAG 22/20     1533        Sac II     CC,GC`GG          5001
Mun I      C`AATT,G          1979        Bst1107 I  GTA|TAC           5117
BamH I     G`GATC,C          2072        Xca I      GTA|TAC           5117
Stu I      AGG|CCT          2505        Spe I      A`CTAG,T          5436
EcoN I     CCTNN`N,NNAGG    3026        BsmA I     GTCTC`/9          5448
BsiC I     TT`CG,AA          3421        BsmB I     CGTCTC 7/11       5449
  
```

➤ pNFκB-TA-luc质粒中推荐使用的测序引物序列如下:

```

RVprimer3 (5600-5619):
CTA GCA AAA TAG GCT GTC CC
  
```

➤ pNFκB-TA-luc的全序列信息请参考碧云天的网站上该质粒的信息。

**包装清单:**

产品编号	产品名称	包装
D2207-1μg	pNFκB-TA-luc (报告基因质粒)	1μg
D2207-100μg	pNFκB-TA-luc (报告基因质粒)	100μg
—	说明书	1份

**保存条件:**

-20°C保存。

**注意事项:**

- 本质粒未经碧云天书面许可不得用于任何商业用途，也不得移交给订货人所在实验室外的任何个人或单位。
- 本产品仅限于专业人员的科学研究用，不得用于临床诊断或治疗，不得用于食品或药品，不得存放于普通住宅内。
- 为了您的安全和健康，请穿实验服并戴一次性手套操作。

**使用说明:**

1. 首次使用1μg包装的本产品时，请先取少量本质粒转化大肠杆菌，进行质粒小量、中量或大量抽提后再用于后续用途。抽提获得的质粒可以通过酶切电泳进行鉴定，或通过测序进行鉴定。
2. 100μg包装的本产品质粒浓度为0.1μg/μl，共1ml。可以直接用于酶切或者转染细胞。
3. pNFκB-TA-luc可用常规的细胞转染方法转染细胞。检测时可采用碧云天的萤火虫荧光素酶报告基因检测试剂盒(RG005/RG006)或双荧光素酶报告基因检测试剂盒(RG027/RG028)。
4. TNF-α、IL-1β和LPS等是常见的可以激活NFκB的试剂，可以用作pNFκB-TA-luc报告基因检测时的阳性对照。

## 使用本产品的文献：

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