

€•, f„ ...† 2(HSF2) ‡ ^ %Š<  
 (Œ• Ž• Lumi nex• ...† ' ' " )  
 " • \_ \_ ~™  
 Š• > œ•

ž Ÿ | € £ š • ¤ ¥ • | § ¨ ©ª !

« ¬ -

[ ® ¯ ° • ]

± %Š< ² • ³ ´ µ ¶ · ¸ ¹ º » ¼½º ¹ ¾¿ ÀÁÂ ¹ ¾¿ ÃÄÅ, ÆÇÈÉÊ—Ë  
 Ë HSF2] ¶ Í

[ %Š< Î Ï ]

%ŠĐÑ	Ò¶	%ŠĐÑ	Ò¶
96ÓÔÕÖ×ØÙ	1	96ÓÔÚÛ	4
ÜÝÞ	2	ÜÝÞßàÀ	1á 20mL
Œâ	1	ã ä å æÀ	1á 20mL
‡ ^ ç ÀÀ	1á 120èL	‡ ^ ßà ÀÀ	1á 12mL
‡ ^ ç ÂBÕPE-SAÛ	1á 120èL	‡ ^ ßà ÂB	1á 12mL
éÀ	1á 10mL	ê ë ì ÑÕ30á Û	1á 20mL
š • > œ•	1		

[ í î ï ð ñ ï ò %Š ]

1<sup>1</sup> Lumi nex MAGPI Xó¤ Lumi nex 100ó¤ Lumi nex

200ó¤ ÆBi o-Radó, Bi o-Pl exóã ä õ Öö ÷ ø ø š • ù ú û @€ , ù ü ý î ‡ þ ÿ Ý Û

2<sup>1</sup> • Æ Ž ¶ Åø ò

3<sup>1</sup> ßà Þ ð EP .

4<sup>1</sup> Æ †

5<sup>1</sup> Œ

6<sup>1</sup> è À ð Ì ø

7<sup>1</sup> 0.01mol /L ÕÆ1á Û å æ (PBS) ¤ pH=7.0-7.2

8<sup>1</sup> ø

9<sup>1</sup> Ü Ö ø

[ %Š< ð ò ¯ ]

1<sup>1</sup> ð%Š< ~ %Š! " %Š#Ü\$Å %& Í ' ( ) ¨\* +%Š< , ' - . / ÜÝÞ¹ † ^ ÇÃÀ  
¹ † ^ ÇÃBOð%ÓÔ& | -201 C ¨ Ç2%Š' 3 | 41 C& ï • Í  
2<sup>1</sup> š• , ð%Š< ~ 42%Š5í " 6%Š#Ü\$ %ð78& Í  
( ) ~  
%Š< Í Ü9: ; < ¨" => í ? : ã @š• Aš• , ð42%Š< ö ÷ BC@=> , 1DEÍ š• FGÍ H  
PI ~ JKO< † ÅðÜ\$LY ¨ & M Í » ã NO&PQµðÍ

[ Ü±ðRST&\_ ]

» ¼½º ~ ¥UVWð» ¼Xî ½º ðY" Z ¥U  
1Ü[ " ¶ » ¼\ ¨ B®] PBSÖ0.01mol/L ¨ pH=7.0-7.2ÜË , ë ^ . Å ¨ ½º ù\_Ñ` Í  
2Ü/ » ¼abc\ ¨ ! ½ð d 3BeÅðf ghÅÅâæÃ(i j IS007 ¨ k l mÜn x ðo¾¼µpq  
r ¥UVWðâæÃ)ðst! MøË ÕŽ c ð» ¼uvwxyz ÜÍ ÕM¶ yz =1:20-1:50 ¨ { w~ 1mLÅÅâ  
æÃË | d20-50mg» ¼ ±Í Ü  
3Ü/ } + ð ~ • Å€ l • , f „ ... t , Í  
4Ü/ Xî ý ð ½º Å10,000ág ' 5ã † ¨ ^ %Š ¨ Å , < : • | † ^ Æ3 | -201 CE& Í  
¾¼ ÅÅÃ ~ Bã ä %> • ù ¨ ¾¼ í Ž • OËY" f „ ~  
1Ü• • ¾¼ ° ' • ] PBS' ' , ë ¨ " , • " n x • - ¨ | 1,000ág ' 5ã † , \* SÍ Õ ~ —¾¼ : ~  
| ' ™ § \* SÜÍ  
2Ü/ \* S + ð¾¼ • ] PBSè3@A  
3Ü/ ¾¼ • ghÅÅâæÃ` ~...» 8L107D¾¼ /œ• ¨ wž í v ¨ ¾¼ : Oÿ • , | f „ ... ÇÃ t , Í  
4Ü/ Ü± | 2-81 C 1,500ág ' 10ã † ¨ ^ %Š ¨ Å , < : • | † ^ Æ3 | -201 CE& Í  
¾¼ ÅÅÃ , ÆÇË —Ü± ~ ' 1,000ág ' 20ã † ¨ [ Å , < : † ^ ¨ Æ / Å , 3 | -201 CÆ-801 C& ¨  
Φ Ε ¨ ¥ | § Í  
( ) ~  
1<sup>1</sup> OÅÜ±! í > & ¨ 41 C& c | 1" ¨ -201 C¥• | 1DE ¨ -801 C¥• | 2DE Í  
2<sup>1</sup> Ü± ©ª Ç• Z « ¬ - , † ^ ®ž ¨ ... x Ç• Ü± ¥ ¬ Ý x ° † ^ Í  
3<sup>1</sup> Ü± š • ù ° â ± ! ² ... ³ 7 ¨ ¥ ° | € š • § Á Í  
4<sup>1</sup> ´ | µ ¶ † ^ ò l ¨ ¶ • , ¹ š • • , ° ¥ P • ° » L ± ÿ † ^ Í

[ Luminex200 ã ä ö ]

- 1. ã ä y ~ 50uLA
- 2. Ž • VW ~ ÇÊ MagPI ex;
- 3. ¼ÇÊ ¶ ~ 50½/¾;
- 4. MFI ç ~ Medi an.

[ %ŠÝí ]

1<sup>1</sup> š• ù/ ð%ŠpÜ±â±! ² ...³ 7 Õ18-251 CÜ ¨ wž ' %Š< B ¬ Å J K Í ¥ Á š • ¨ ' ž [ © ±  
@%> í ð Ü9p%Š ¨ ù / 42ð Ü9ð%Š" Åµ9Ã& Í  
2<sup>1</sup> ÜÝÞ( | Ä Þ) ~ Å#ÜÝÞ | dÜÝÞBà Å0.5mL ¨ Æý , ³ 7 Ç3µË10ã † ¨ UJ ' ' ÉË ÕΦÉË  
Ì Ü ¨ Çè 8L10.0ng/mL Í Ýí 7DBà ÜÝÞðEP ¨ ÅDEP Ë | d300Í LðÜÝÞBà Å ¨ wÍ %k  
@Í z B à b10.0ng/mL, 2.5ng/mL, 0.62ng/mL, 0.16ng/mL, 0.04ng/mL, 0.01ng/mL, 0.0ng/mL ¨ ÜÝÞBà  
Å (0ng/mL) ™ š » L Ö x Ó Í L & Ð = > ® ž • ¨ Å @ = > ' š • g ð ÜÝÞ Ç Å Í

item	1	2	3	4	5	6	7	Tube
HSF2	10.0	2.5	0.62	0.16	0.04	0.01	0	ng/mL

31 Detection A Detection B  $\cdot \dot{u} \cdot \ddot{N} \ddot{O} \ddot{O} \ddot{E} \ddot{O} \ddot{O} \cdot f, \pi \text{O} \ddot{S} \ddot{O} \times \text{B}$   
 $\cdot \text{E} \# \text{E} \ddot{O} \ddot{A} \cdot \% \text{y} + \text{O} \dot{\text{I}} \text{S} \cdot \dot{u} \ddot{a} \ddot{U} \text{O} \ddot{t} \wedge \beta \ddot{a} \ddot{A} \text{A} \text{E} \text{B} 1:100 \beta \ddot{a} (\text{w} \sim 10 \dot{\text{I}} \text{L} \ddot{t} \wedge \text{c} \ddot{A} \text{A} / 990 \dot{\text{I}} \text{L} \ddot{t} \wedge \beta \ddot{a}$   
 $\ddot{A} \text{A}) \pi \ddot{U} \ddot{a} \ddot{U} \frac{1}{2} \pi \beta \ddot{a} \dot{u} \ddot{U} \text{I} \text{R} \_ \ddot{Y} \text{P} \dot{\text{y}} \ddot{O} \ddot{A} \text{@} = > \dot{\text{I}} \ddot{O} \frac{1}{4} \eta \text{B} \text{X} (100 \dot{\text{I}} \text{L} / \text{O}) \pi = \ddot{a} \text{B} \text{X} \text{J} \cdot \text{B} \text{X} 0.1 - 0.2 \text{mL} \dot{\text{I}}$

41  $\ddot{e} \ddot{e} \dot{\text{I}} \ddot{A} \sim 580 \text{mL} \quad \text{E} \quad \ddot{t} \quad | \text{d} 20 \text{mL} \dot{\text{e}} \dot{\text{I}} \ddot{A} \ddot{O} 30 \ddot{a} \ddot{U} \beta \ddot{a} \dots 600 \text{mL} \dots \ddot{a} \gg \ddot{A} \dot{\text{e}} \text{B} \dot{\text{I}}$   
 ( ) ~

11  $\ddot{U} \ddot{Y} \text{P} \ddot{O} \beta \ddot{a} \text{A} \text{TM} \ddot{s} \text{B} \ddot{O} \ddot{E} \ddot{Y} \quad \dot{\text{I}}$   
 21  $\ddot{U} \ddot{Y} \text{P} \cdot | \text{S} \cdot \dot{u} 15 \ddot{a} \ddot{t} \dot{\text{I}} \text{B} \text{X} \dot{\text{I}} \cdot \ddot{U} \ddot{Y} \text{P} \ddot{a} \ddot{A} \ddot{s} \cdot \text{~} \text{@} \dot{\text{I}}$   
 31  $\ddot{U} \ddot{Y} \text{P} \dot{\text{t}} \wedge \text{c} \ddot{A} \text{A} \ddot{a} \gg \ddot{A} \dot{\text{I}} \dot{\text{t}} \wedge \text{c} \ddot{A} \text{B} \ddot{a} \gg \ddot{A} \cdot \ddot{s} \cdot \text{E} \cdot \ddot{O} \beta \ddot{a} \ddot{A} \text{B} \text{X} \pi \beta \ddot{a} \ddot{A} \text{A} \text{U} \cdot \dot{\text{I}} \cdot \ddot{A} \ddot{a} \cdot \cdot \ddot{a} \ddot{a}$   
 $\ddot{U} \ddot{a} \ddot{U} \frac{1}{2} \pi \text{E} \text{E} \dot{\text{I}} \dot{\text{I}} \text{L} \& \text{D} = > \text{R} \ddot{z} \ddot{O} \ddot{Y} \text{O} \cdot \cdot \ddot{s} \cdot \ddot{Z} \eta \quad \pi \dot{u} \dot{\text{y}} \ddot{Y} \ddot{Z} \eta \quad \ddot{A} \text{O} \dot{\text{I}} \cdot \text{k} \dot{\text{I}} \quad \dot{\text{I}} \ddot{O} \eta \text{a} \text{O} \text{B}$   
 $\text{X} \pi - \eta \text{A} \text{v} \ddot{s} \cdot \ddot{Z} \eta \text{B} \text{X} \ddot{O} \text{Y} \text{O} \ddot{w} \quad [ \dot{\text{t}} \wedge \text{c} \ddot{A} \text{A} \text{J} \pi \text{~} \text{@} \text{A} \text{v} \text{c} | 10 \dot{\text{I}} \text{L} \ddot{U} \pi \text{O} \text{F} \text{E} \text{c} \text{b} \dot{\text{e}} \text{S} \dot{\text{e}} \dot{\text{e}} \dot{\text{I}}$

41  $\cdot \dot{\text{e}} \cdot \text{A} \text{S} \cdot \dot{\text{e}} \in \beta \ddot{a} \dot{\text{I}} \ddot{O} \ddot{U} \ddot{Y} \text{P} \dot{\text{t}} \wedge \text{c} \ddot{A} \text{A} \ddot{a} \gg \ddot{A} \text{P} \dot{\text{t}} \wedge \text{c} \ddot{A} \text{B} \ddot{a} \gg \ddot{A} \dot{\text{I}}$   
 51  $\dot{\text{e}} \dot{\text{I}} \ddot{A} \ddot{O} 30 \times \ddot{U} \ddot{E} \text{w} \quad \text{R} \dot{\text{I}} \ddot{a} \text{O} \pi \cdot \_ 7 \dot{\text{I}} \dots \text{3} \text{7} \pi \cdot \cdot \ddot{U} \frac{1}{2} \pi \dots + \text{R} \dot{\text{I}} \text{F} \dot{\text{I}} \text{c} \ddot{A} \dot{\text{I}} \ddot{Y} \quad \text{B} \text{X} \dot{\text{I}}$   
 61  $\% \text{S} < \ddot{E} \ddot{O} \ddot{a} \% \text{S} \text{L} \quad \ddot{A} \pi \ddot{n} \dot{\text{O}} \dot{\text{I}} \text{B} 3 \text{b} \ddot{a} \gg \ddot{A} \cdot \ddot{s} \cdot \pi \text{B} \text{B} 3 \text{I} \text{O} \ddot{E} : \ddot{A} \dots \text{L} \text{O} \ddot{O} \text{M} \eta \dot{\text{e}} \text{E} \text{M} \ddot{O} \div \pi$   
 $\text{O} \ddot{O} = > \ddot{E} \cdot \text{O} \dot{u} \dot{u} \ddot{O} \text{S} \dot{\text{e}} \pi \text{c} \text{b} = > \text{R} \ddot{z} \text{A} \text{Y} \text{O} \pi \dot{u} \dots \text{F} \dot{\text{I}} \dot{u} \dot{\text{e}} \dot{\text{I}} \cdot \ddot{s} \cdot \text{3} \quad \text{B} 3 \dot{\text{I}}$

[ Ü±f,~ ]

11  $\pm \dot{\text{y}} \text{p} \dot{\text{a}} \dot{\text{y}} \% \text{S} < \pm \quad \pi \text{A} \dot{\text{y}} \dots \ddot{s} \cdot \cdot \cdot \% \text{S} < \quad \text{c} \text{b} \ddot{O} \quad \pm \cdot \text{O} \quad \pi \cdot \ddot{s} \cdot \quad \ddot{s} \cdot \dot{u} \ddot{U} \ddot{a} \quad + \quad \pm \ddot{O}$   
 $: \ddot{A} \ddot{s} \cdot \eta \pi \text{R} \quad \ddot{U} \quad \ddot{O} \quad \pm \dot{\text{I}}$   
 21  $= > \dot{u} \cdot \_ \text{R} \wedge \quad \pm \ddot{E} \quad \wedge - \dot{\text{e}} \text{S} \dot{\text{I}} \quad \dot{\text{e}} \text{S} \text{A} \text{B} \ddot{U} \ddot{Y} \quad \ddot{O} \quad \dot{\text{I}} \text{J} \pi \cdot \ddot{O} \quad \text{O} \mu \text{C} \quad \mu = > \ddot{O} - \quad \text{P} \text{B}$   
 $\ddot{a} \dot{\text{I}} \text{O} \dot{\text{I}} \text{w} \ddot{z} \quad \text{P} \ddot{E} \quad \wedge - \dot{\text{e}} \text{S} \dot{\text{I}} \quad \text{A} \text{E} \quad \pi \cdot \dot{\text{y}} \quad \pm \ddot{u} \text{O} \quad \ddot{O} \beta \ddot{a} \text{A} \dot{\text{e}} \quad \dot{\text{I}} \quad \pm \beta \ddot{a} \dot{\text{I}} \cdot \text{P} \text{B} \dot{\text{S}} \dot{\text{I}}$   
 31  $\dot{\text{t}} \quad \pm \text{A} \quad \dot{\text{I}} \text{B} > \text{a} \cdot \quad \pm \cdot \ddot{E} \pi \ddot{O} \div \ddot{Y} \quad \text{R} = > > \text{D} \text{C} \quad \cdot \pi \dot{u} ( ) \quad \pm \dot{\text{I}}$   
 41  $\ddot{s} \cdot - \quad \ddot{A} \ddot{A} \ddot{X} \dot{\text{I}} \ddot{O} \gg \frac{1}{4} \frac{1}{2} \text{O} \text{A} \frac{3}{4} \dot{\text{z}} \dot{\text{u}} [ \ddot{A} : \ddot{A} \text{Z} \quad | \quad - \quad - \text{M} \ddot{O} \text{d} \quad = > \text{R} \ddot{z} \quad \dot{\text{e}} \dot{\text{I}}$   
 51  $\pm \text{L} \frac{3}{4} \dot{\text{z}} \ddot{A} \ddot{A} \ddot{A} \cdot \pi \dots \text{L} \cdot \text{V} \quad \pm \ddot{A} \text{I} \dots \text{O} \# \quad \pi \text{w} \sim \frac{3}{4} \dot{\text{z}} \text{S} \% \text{I} \frac{3}{4} \dot{\text{z}} \ddot{O} \eta \dot{\text{I}} \text{R} \text{J} \text{K} \& \pi \text{O} : \ddot{A} \text{B}$   
 $\dot{\text{t}} \wedge \text{A} \text{O} \ddot{O} \cdot ( \dot{\text{I}}$   
 61  $) \text{O} \text{N} \times \text{A} \text{E} \gg \text{N} \times \pi \quad \cdot + , \ddot{O} - , \text{O} \gg \text{N} \times \pi : \ddot{A} \dots \text{L} \text{T} \pm \text{H} \text{P} \quad \ddot{s} \cdot \ddot{O} \dot{\text{t}} \wedge \dot{\text{I}} \quad \ddot{O} . / \dot{\text{I}} \quad \text{A} \text{O} \text{B}$   
 $\pi \text{O} \text{A} \text{O} \dot{\text{t}} \wedge \text{O} \dot{\text{I}}$   
 71  $\ddot{O} \div \ddot{s} \cdot \text{gh} \quad \pm \pi \& \text{J} \text{K} \text{I} 1 : \ddot{A} \text{Z} \dots \text{n} \times 2 \ddot{A} \text{E} 3 \cdot \text{O} \quad = > \text{R} \ddot{z} \quad \dot{\text{e}} \dot{\text{I}}$

[ 4»56 ]

11  $/ = > \ddot{O} \ddot{O} \ddot{A} \dot{\text{O}} \dot{\text{I}} \quad | \text{d} 200 \text{ul} \ddot{a} \ddot{a} \ddot{a} \text{a} \text{e} \ddot{A} \cdot \text{O} \text{R} 7 \pi \quad 8 , \text{B} \quad \ddot{U} \ddot{O} \quad \text{O} \ddot{A} \text{3} \text{7} 9 \quad 10 \ddot{a} \dot{\text{t}} \pi \cdot , \quad \ddot{O} \ddot{A} \dot{\text{O}} \dot{\text{I}}$   
 $\ddot{A} \quad \pi < : \cdot | | \quad 4 \gg \dot{\text{I}}$   
 21  $| \quad \sim \ddot{a} \ddot{U} \ddot{n} \ddot{U} \ddot{Y} \dot{\text{O}} \dot{\text{I}} \quad \wedge \quad \text{P} \dot{\text{O}} \dot{\text{I}} \quad \ddot{O} \times \dot{\text{O}} \dot{\text{I}} \quad \ddot{n} \ddot{U} \ddot{Y} \dot{\text{O}} \dot{\text{I}} \text{O} \pi \text{k} \text{@} | \text{d} 100 \dot{\text{I}} \text{L} \text{A} \text{U} \dot{\text{e}} \text{S} \ddot{O} \ddot{U} \ddot{Y} \text{P} \ddot{O} : \% \text{S} \dot{\text{Y}} \dot{\text{I}} 2$   
 $\ddot{U} \dot{\text{I}} \quad \ddot{O} \times \dot{\text{O}} | 100 \dot{\text{I}} \text{L} \ddot{U} \ddot{Y} \text{P} \beta \ddot{a} \ddot{A} \ddot{O} : \% \text{S} \dot{\text{Y}} \dot{\text{I}} \ll ; 5 - , \text{~} \quad \ddot{U} \pi 2 \dot{\text{O}} | \quad \wedge \quad \text{P} \ddot{O} \text{E} \beta \ddot{a} , \ddot{O} \quad \text{P} \ddot{U} 100 \dot{\text{I}}$   
 $\text{L} \pi \ddot{A} \dot{\text{O}} | 10 \text{ul} \text{E} \ddot{a} \pi \quad \ddot{U} \ddot{O} | \ddot{A} \ddot{U} \ddot{U} \pi 371 \text{C} \quad \ddot{U} \ddot{O} \quad \text{O} \text{7} \dot{\text{I}} \text{1.5c} \text{J} \pi \quad \ddot{E} < = \ddot{n} 3 \text{L} 800 \text{rpm} \pi \quad > 2 - 4 \text{mm}$   
 $\pi ? \text{O} \text{E} \ddot{a} \% 2 \dot{\text{I}}$   
 31  $\ddot{A} \text{E} \quad \pi 2 \ddot{a} \dot{\text{t}} , \quad \wedge \quad \ddot{A} \quad \pi \text{E} \quad \& \text{A} \ddot{O} \text{S} \% \text{E} \ddot{O} \ddot{A} \pi \text{A} \cdot \dot{\text{e}} \dot{\text{I}} \quad \dot{\text{I}}$   
 41  $\ddot{A} \dot{\text{O}} | \dot{\text{t}} \wedge \text{c} \ddot{A} \text{A} \ddot{a} \gg \ddot{A} 100 \dot{\text{I}} \text{L} \ddot{O} \text{S} \cdot \dot{u} \text{B} \text{X} \ddot{U} \pi \quad \ddot{U} \ddot{O} \ddot{U} \ddot{U} \pi 371 \text{C} \quad \ddot{U} \ddot{O} \quad \text{O} \text{7} \dot{\text{I}} \text{1c} \text{J} \pi \quad \ddot{E} < = \ddot{n} 3$   
 $\text{L} 800 \text{rpm} \pi \quad > 2 - 4 \text{mm} \pi ? \text{O} \text{E} \ddot{a} \% 2 \dot{\text{I}}$

- 5<sup>1</sup> ÅÆ ²ā ‡, ^ Å ²ÅÓ• 200í lðèì Âèì ²Bì 1-2ā ‡² ^ Óí Å í ` ¥èÔ3@ í -, -@èì , ² [ÆC@42ðèì åæÃ²/ ÜÔCDB EÅ²/F BÓí ðÃ í ð Å í xí óu: î ÊÆ èÔGHF bí
- 6<sup>1</sup> ^Æ ²ÅÓ| ‡ ^ ç ÃBá» ÃÕ§ • ùBXÜ100í L² ÜÔÚÜ²371C ÜÔ ø730ā ‡² Ê <=ñ 3L 800rpm² >2-4mm²? @Æâ %02í
- 7<sup>1</sup> ÅÆ ²ā ‡, ^ Å ²ÅÓ• 200í lðèì Âèì ²Bì 1-2ā ‡² ^ Óí Å í èÔ3@²Y " U565í
- 8<sup>1</sup> ^Æ ²ÅÓ| éÃ150í L² 9 2ā ‡² š Ž • í ~—\$%²< : ÅGJ Òí () ~
- 1<sup>1</sup> %ŠÝí ~ Ýí -@=> í v ð Ü9²çÈð: KŽÓÔÅ; Æ²> ²" 6> œ• v?& ²Oí Æ@ š • í
- 2<sup>1</sup> | ~ =>4» È' š • -@• ðLM ²çÉö÷í | J() ¥v Nì H-²/ Þ| ; ÜÔØð ²- ¶¥OðÓ• ²' ' PÉÛ½í T²° %Š | d- ² | í óÈ« -DÓT- , -DÓ| JKKQ- ¶cÖ-RSX B10ā ‡Oí Ü²wž Tµ²/Z ¥UðU®7í VJK²K° œWX« -+ ^ ¶¿ ðÝ O• ð` ¥• í LY ^ ¿ ðÝO• ², ¹ ñ3¥ÓÝ =>í
- 3<sup>1</sup> 7í ~ L?@ Þ Z²=>J' / | ÅÆÉÚÜð ÜÔ3; 7< í ²OçÉÅ Z²èÔ, ° - . Ý Æ54» ²[ \J ] N° çÉ ÜÔf; Ä ^ \$%²UJ ° \_ ` abcµð7í JKp78í
- 4<sup>1</sup> èì ~ Úāèì de ` v²BÅ@èì | óÈ²Nv/èì ÅFí ÒÄí wž š • í ÊèÔG²' Bf gš • , í • | hi =>í óÈí
- 5<sup>1</sup> wž =>³ í 78 | 60%², ¹ š • | 7øú 78 j í

[ =>+ „ ]

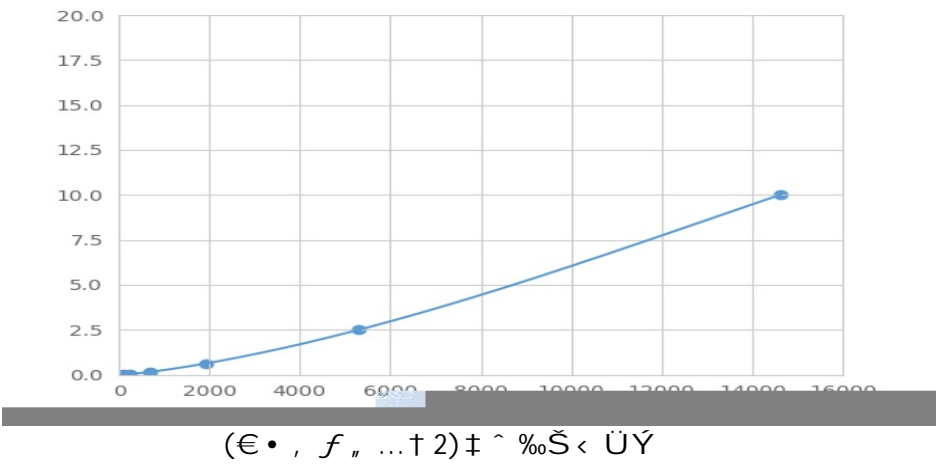
/HSF2´ Ø; Æ• Ž• k í ²XbmÉn ²oŽ• È ā Û | dÜÝ ÞÆÜ± ²çÈ HSF2T pš ; mÉn Åð´ ®q²" , | d—" -ðHSF2´ ²B/ ®qð—" -´ èð, ² | dPEÛr ðsp" ²PEØ t Z , ²Üí MFI¿ ÖMedian Fluorescence IntensityÜðµç Þ ÈðHSF2è8í hÉÉí • Lumi nexā ä ò ^ µ²Ý Þ Þè8í

[ Ý Þ ]

uÜÝ Þð ±MFI¿ D^ÖxÓMFI¿ , » Í Övwí Ü²wñ3¥Ó²²° [ Çj ! ¿ Ý Þí OÜÝ Þðè8 Lyz ÜÖÆý Òz ÜÜ²MFI¿ L { z ÜÖÆý Òz ÜÜ² | ©ÜÝ Ö- Yóí ° k } ~YóÝ ÞðR2¿ Hµ²OR2¿ • €• | 1LyÜí , ¹ š • , fX» „ ÅÝ ā ä ²wcurve expert 1.30²Üí ÞMFI¿ ² ÜÝ ...©É° ðè8²†OBàí ÒAÆ• ÜÝ—ðè8TMFI¿ Ý Þ©ÜÝ ð } ~Yóí ²/ Þð MFI¿ ‡dYóí ²Ý Þ© Þè8²†OBàí Ò²< L Þð=àè8í

[ ^ WÒI ]

LY%0| Ý Þ²- è8Lí 3¶° MFI¿ L...3¶²²¶ • | Í J5R• ÜÝ ÞðMFI¿ » L { z ÜÖXŠ Ü²ÜÝ Þðè8Lyz ÜÖYŠÜí UJ LY%0> ®ž ð™< • ²í È úÝ ðP+ÆÒí ° dý Ò¿ í , ¹ š • ý Ò¿ ö • ÜÝ Í í | =>4» 9Ãð¥UÖw4» ¹ ÅŽ • ¹ èÔŽ • Þ789Ã&Ü²ÜÝ ðMFI¿ Z é• í úÝ ðÜÝ ž Ý' ²=> í vÜí î èð=>ö• ÜÝ í



[ ‡ ^ \_\_\_\_\_ ]

0.01-10ng/mL.

[ - ‡ ^ ' \_\_\_\_\_ ]

x¿L20DÖx ÞÖ< ÜÝÞΒàÃÛ^ μδj ! ¿ | ; ĩ ÜÝé ý° ðê8Í

[ •• \_\_\_\_\_ ]

±%Š< • | ‡ ^ HSF2α€ ‡ ^ TÇÈÉ" —M" œW• — α° Í  
 | —+Ž•ò ±H~ ð' Xα¥: ÁFb ÉÊÆÉ" —M• — α° ‡ ^ α...x ±%Š< : ÁT € ‡ ^ ðÇÈ—M • — α° Í

[ æ> 8 \_\_\_\_\_ ]

æ> 8• Þ^ μ¿ ð3•™ÒCVk %Í CVÖ%Û = SD/meaná 100  
 šÍ é~ [ Uš@%Š< ý 1 Ē1 ¿μ¿ ±Ý μ¶ ‡ ^ αÁ> ±pœ^ μ20  
 @αãÜÝÞ¥Uê8 ±ðj ! ¿ ðSD¿Í  
 šKé~ q[ 3D¥Uš@ð%Š< ãÛý 1 Ē1 ¿μ¿ ±Ý μ¶ ^ μαÁD ±š• U~%Š< ` ¥^  
 μ8@αãÜÝÞ¥Uê8 ±ðj ! ¿ ðSD¿Í  
 šÍ é~ CV<10%  
 šKé~ CV<12%

[ Qμ• \_\_\_\_\_ ]

€^ μα%Š< B - Ĩ • " , 1 78& αž• 2 =/c | 5%Í  
 Lÿc | ð..." ý%Š< | ù, ‡ ^ ¿ ð« ~α=>³ ðΦ£9ÁÍ - ¶&A~ ααÇP=>³ Í 78' 7  
 8ð7í 9ÁÍ Ç@ U~=>¥Hÿ 4»: Ý |™LèéÍ

[ => Š ó \_\_\_\_\_ ]

1^ => ù ÜÝÞ¹ %Š< ð ±Ý ĩ A  
 2^ | ÖÜÝÞÆ ±Û100Í Lα | Æâ α371 C ÜÔ ø" í 1.5cJ A  
 3^ Æ ÒĂα | ‡ ^ ÇÃA100Í Lα371 C ÜÔ ø" í 1cJ A

4<sup>1</sup> Ę ëŌ3@A  
 5<sup>1</sup> | ‡ ^ ĉ ĀB100Í Lx371C Ę " í 30ā ‡ A  
 6<sup>1</sup> Ę ëŌ3@A  
 7<sup>1</sup> | é Ā150Í Lx 9 2ā ‡ , J ŌÍ

[ > œ ]

1<sup>1</sup> |<sup>a</sup> 9Āò© Ž• j<sup>a</sup> ¥Áÿÿi « úÿō + -ÿ î | ð - µTāā ±HP: Á B -  
 µōMŋŽ• ®<sup>-</sup> Í  
 2<sup>1</sup> - ° ð => ®ž T%Šð • 1 => ðÉÉ4» Oð => çÉ> aÉÉx' • Ýi Ú ðÜ±i > Í  
 3<sup>1</sup> ¥Uš@ðU-HP: ÁZ | ±éÜxw~ ‡ ^ ' 1 2 3 8x' k | %Š< Í > œ• Ý => 4» x' µŋ  
 † - > œ• ž » ' Í  
 4<sup>1</sup> ±%Š< B• %Š B• š• x¥ÁÛ• Ç, Xç« ðHPÍ â \_` ab±%Š< ð =>> œ<sup>1</sup> Z } + -  
 ð ‡ ^ ®ž Í  
 5<sup>1</sup> B ò7Í | óĚçÉ/%Š° » B¼½ĚÍ %Š#Æ Æ¾O?@ ZpŽ-—ö÷x...Ln x Á  
 ðĀ! / ^ ĵ ¥ÝŌÍ  
 6<sup>1</sup> ĵ Āð ÁŌŌŌĚ: ÁZ | ± -MxLhe<sup>a</sup> Āx¥Zÿ=>®ž çb[ \« -Í ÜŌBš•  
 JK fĀĀ[ ©x' éúù[ ©Í  
 7<sup>1</sup> | 4» ¥fg<sup>1</sup> 4» ĀèÆüèq• J ŌðóÆ&N : Á üè®ž ðH-Í =>ù' Ç¾ĚJ > œ  
 • ùÉ%ōøÍ  
 8<sup>1</sup> B ±Xi Ōð4» ðĀDI óĚð3-N: Á ¥Uð=>®ž x OLYú =>®ž ð: ` ¥• x =  
 >ðĀ-54» Ní v\_` SXÍ  
 9<sup>1</sup> %Š< B©Ěù! € | \_` M‡xĚ | 2 | 9Āòu=><sup>3</sup> 9Āé• x: ÁZçb=>®ž T©Ě®ž ¥-  
 Æ¥Uš@%Š< šKéÍ µð' ( Í  
 10<sup>1</sup> ±%Š< TÇ, ĚÍ UV%Š< Æ¥UY" ‡ ^ U-mð-ðHPüÿz x ŌŸÍ ^ ‡ ^ ®ž ¥- ð  
 ' ( Í  
 11<sup>1</sup> • | Xi %Š< Ě´ ðĚð+~ eL` » nx xĚ | i ` » nx q[ ðÑĀ<sup>1</sup> kŌ™Ō<sup>1</sup> ô-Yi &  
 u ¥Ux Ōŋ. " " &ð' %Š< : • | Ç, ýp` » nx ð ‡ ^ x~ eŋ. u¥ö÷š• %Š< ‡ ^ `  
 » nx Í  
 12<sup>1</sup> ' ®Ō pĚ ^ -ðè8xÆ ñÝ®=>Ōµ p‡ ^ è8Í Ō ðf„ : Ō?@ ±Ě ‡ -Í ŋ•  
 ©%Š< ‡ ^ Í  
 13<sup>1</sup> ' %Š< : Á¥" • | - =>± • ¥Ōµð Ō=> pð ‡ ^ x { wx' ...x ^ => &Í  
 14<sup>1</sup> ±4» > œU " • | 48T%Š< Í  
 15<sup>1</sup> ' %Š< žÝçÉš• xw/Ç• | š" ©<sup>a</sup> Æ[ \Ç, • Øxŋ ýp/¥ÿ...xH-ðÜÜ xÜ¥Ü  
 Ý[ \ " p [ Í

[ ÛÚÁß ]

ÛÚ	: Á+...	ÁàYá
ÜÝ é	ÜÝpÝi ¥hŌ	Ý hŌðÜÝpá8Bà
	[ òèì ¥Úā	Úāð [ òèì
	Ā¥æŌ	‡...pÿh Āø

æ > 8	Œâ èi ¥Úã	" > œ• v? Úã 9 èi pBÌ
	Ū½¥Úãp [ %Š¥	ÚãŪ½p [ %Š
	` ¥Ž• 1 i øpÚŪ	š•   øvãägð 1 š• gđi øpÚŪ
	¥æO	‡...pÿh Åø
MFİ ĺ	ÅÓ  ð%Šŋ ¥æO	ÿh Åø æO   d%Š
	7í JK¥hO	&ĐÚ ð7í JK
	7í 78¥hO	%Švj <sup>2</sup> ... <sup>3</sup> 7ú&ĐY Oð7 í 78
	PEÛr –Å	ã ä%Š
	PEÛr –BàĪ Ò¥ÿ	" 6 > œ• => 4»
	• ©J ÒJ KJ Ò	B> œ• , 1 ðJ ÒJ KĪ J Ò
± ĺ	¥hOð ± Yi	hO ± æš• gh ± Ÿ =>
	¥hOð ± * Spf „ Y"	R[ hOð ± * Spf „ Y"
	^ –MB ± ÈĪ ŋ	š• gh ± æ` ¥=>