

Figure 1a

Met Ile Pro Ala Ser Ala Leu Leu Ala Ala Val Pro Leu Leu Ala Gln
Gln Val Ser Ala Gly Ile Leu Arg Arg Gln Asn Ala Ala Gly Ser Asp
Ser Ala Ala Pro Asp Ser Ile Ala Asp Ala Ser Thr Gly Val Val Ser
Ser Ile Ala Thr Glu Ala Val Ser Ser Gly Ala Thr Gly Leu Val Ala
Ser Val Ala Met Ser Phe Ala Ser Ser Met Ala Thr Pro Thr Ala Thr
Val Thr Gly Leu Ser Ser Glu Thr Gly Ala Pro Ser Asn Thr Pro Met
Ala Ser Ala Ser Gly Ser Val Pro Thr Thr Thr Ser Ala Val Gly Ser
Gly Asp Phe Asp Trp Val Gln Thr Asp Gly Leu Pro Thr Ile Thr Thr
Thr Leu Ala Thr Thr Asn Gln Asp Ala Ile Thr Pro Thr Ala Thr Gly
Pro Val Gly Gly Gln Gly Thr Pro Ala Val Asn Phe Thr Asp Tyr Ser
Ser Ser Ser Leu Glu Gln Phe Trp Asn Asp Trp Val Gly Glu Val Glu
Glu Pro Pro Phe Ala Tyr Val Pro Glu Pro Pro Asn Pro Tyr Pro Leu
Pro Asn Ala Pro Pro Pro Ile Tyr Pro Glu Tyr Tyr Thr Lys Arg Pro
Lys Asp Ile Leu Pro Asp Tyr Lys Phe Pro Lys Asp Phe Leu Phe Gly
Trp Ala Thr Ala Ala Gln Gln Trp Glu Gly Ala Val Lys Ala Asp Gly
Lys Gly Pro Ser Ile Trp Asp Trp Ala Ser Arg Phe Pro Gly Phe Ile
Ala Asp Asn Thr Thr Ser Asp Val Gly Asp Leu Gly Tyr Tyr Leu Tyr
Lys Glu Asp Leu Ala Arg Ile Ala Ala Leu Gly Ala Asn Val Tyr Ser

Phe Ser Met Phe Trp Thr Arg Ile Phe Pro Phe Gly Lys Ala Asp Ser
Pro Val Asn Gln Ala Gly Ile Asp Phe Tyr His Asp Leu Ile Asp Tyr
Ser Trp Ser Leu Gly Ile Glu Pro Val Val Thr Leu Phe His Trp Asp
Thr Pro Leu Ala Leu Gln Leu Glu Tyr Gly Gly Phe Ala Ser Glu Arg
Ile Ile Asp Asp Tyr Val Asn Tyr Ala Glu Thr Val Phe Lys Ala Tyr
Asn Gly Ser Val His Lys Trp Val Thr Phe Asn Glu Pro Val Val Phe
Cys Ser Gln Met Ala Ala Pro Val Asn Thr Thr Leu Pro Pro Asn Leu
Asn Ser Thr Ile Tyr Pro Tyr Thr Cys Ser Tyr His Leu Val Leu Ala
His Ala Lys Thr Val Lys Arg Phe Arg Glu Leu Asn Ile Gln Gly Gln
Ile Ala Phe Lys Ser Asp Asn Phe Val Gly Ile Pro Trp Arg Glu Gly
Asn Gln Glu Asp Ile Asp Ala Val Glu Arg His Gln Ala Tyr Gln Ile
Gly Ile Phe Ala Glu Pro Ile Tyr Asn Thr Gly Asp Trp Pro Asp Ile
Val Lys Asn Asp Leu Ser Pro Asp Ile Leu Pro Arg Phe Thr Asp Asp
Glu Ile Ala Met Ile Lys Cys Thr Ala Asp Phe Phe Pro Ile Asp Gly
Tyr Arg Asp Gly Tyr Val Gln Ala Val Pro Gly Gly Val Glu Ala Cys
Val Ala Asn Ile Ser Asn Pro Leu Trp Pro Ala Cys Asn Gln Val Asn
Phe Tyr Asp Ser Thr Pro Ala Gly Trp Ala Ile Gly Thr Phe Gly Asn
Trp Pro Thr Thr Pro Trp Leu Gln Asn Thr Trp Gln Phe Val Arg Pro
Phe Leu Ala Asp Leu Ala Lys Arg Tyr Pro Thr Glu Gly Gly Ile Tyr
Leu Ser Glu Phe Gly Phe Ser Glu Pro Phe Glu Asn Asp Lys Thr Phe

Ile Tyr Gln Ile Thr Gln Asp Ser Gly Arg Thr Ala Tyr Phe Asn Ser
Tyr Leu Gly Glu Val Leu Lys Gly Ile Val Glu Asp Gly Ile Pro Ile
Lys Gly Val Phe Gly Trp Ser Met Val Asp Asn Phe Glu Trp Asn Ser
Gly Leu Ser Thr Arg Phe Gly Val Gln Tyr Val Asp Tyr Asn Ser Pro
Thr Arg Gln Arg Thr Phe Lys Arg Ser Ala Leu Glu Met Ser Glu Phe
Trp Asn Ala His Arg Cys Ser Ala

Figure 1b

Ala Thr Thr Asn Gln Asp Ala Ile Thr Pro Thr Ala Thr Gly Pro Val
Gly Gly Gln Gly Thr Pro Ala Val Asn Phe Thr Asp Tyr Ser Ser Ser
Ser Leu Glu Gln Phe Trp Asn Asp Trp Val Gly Glu Val Glu Glu Pro
Pro Phe Ala Tyr Val Pro Glu Pro Pro Asn Pro Tyr Pro Leu Pro Asn
Ala Pro Pro Pro Ile Tyr Pro Glu Tyr Tyr Thr Lys Arg Pro Lys Asp
Ile Leu Pro Asp Tyr Lys Phe Pro Lys Asp Phe Leu Phe Gly Trp Ala
Thr Ala Ala Gln Gln Trp Glu Gly Ala Val Lys Ala Asp Gly Lys Gly
Pro Ser Ile Trp Asp Trp Ala Ser Arg Phe Pro Gly Phe Ile Ala Asp
Asn Thr Thr Ser Asp Val Gly Asp Leu Gly Tyr Tyr Leu Tyr Lys Glu
Asp Leu Ala Arg Ile Ala Ala Leu Gly Ala Asn Val Tyr Ser Phe Ser
Met Phe Trp Thr Arg Ile Phe Pro Phe Gly Lys Ala Asp Ser Pro Val
Asn Gln Ala Gly Ile Asp Phe Tyr His Asp Leu Ile Asp Tyr Ser Trp
Ser Leu Gly Ile Glu Pro Val Val Thr Leu Phe His Trp Asp Thr Pro
Leu Ala Leu Gln Leu Glu Tyr Gly Gly Phe Ala Ser Glu Arg Ile Ile
Asp Asp Tyr Val Asn Tyr Ala Glu Thr Val Phe Lys Ala Tyr Asn Gly
Ser Val His Lys Trp Val Thr Phe Asn Glu Pro Val Val Phe Cys Ser
Gln Met Ala Ala Pro Val Asn Thr Thr Leu Pro Pro Asn Leu Asn Ser
Thr Ile Tyr Pro Tyr Thr Cys Ser Tyr His Leu Val Leu Ala His Ala

Lys Thr Val Lys Arg Phe Arg Glu Leu Asn Ile Gln Gly Gln Ile Ala
Phe Lys Ser Asp Asn Phe Val Gly Ile Pro Trp Arg Glu Gly Asn Gln
Glu Asp Ile Asp Ala Val Glu Arg His Gln Ala Tyr Gln Ile Gly Ile
Phe Ala Glu Pro Ile Tyr Asn Thr Gly Asp Trp Pro Asp Ile Val Lys
Asn Asp Leu Ser Pro Asp Ile Leu Pro Arg Phe Thr Asp Asp Glu Ile
Ala Met Ile Lys Cys Thr Ala Asp Phe Phe Pro Ile Asp Gly Tyr Arg
Asp Gly Tyr Val Gln Ala Val Pro Gly Gly Val Glu Ala Cys Val Ala
Asn Ile Ser Asn Pro Leu Trp Pro Ala Cys Asn Gln Val Asn Phe Tyr
Asp Ser Thr Pro Ala Gly Trp Ala Ile Gly Thr Phe Gly Asn Trp Pro
Thr Thr Pro Trp Leu Gln Asn Thr Trp Gln Phe Val Arg Pro Phe Leu
Ala Asp Leu Ala Lys Arg Tyr Pro Thr Glu Gly Gly Ile Tyr Leu Ser
Glu Phe Gly Phe Ser Glu Pro Phe Glu Asn Asp Lys Thr Phe Ile Tyr
Gln Ile Thr Gln Asp Ser Gly Arg Thr Ala Tyr Phe Asn Ser Tyr Leu
Gly Glu Val Leu Lys Gly Ile Val Glu Asp Gly Ile Pro Ile Lys Gly
Val Phe Gly Trp Ser Met Val Asp Asn Phe Glu Trp Asn Ser Gly Leu
Ser Thr Arg Phe Gly Val Gln Tyr Val Asp Tyr Asn Ser Pro Thr Arg
Gln Arg Thr Phe Lys Arg Ser Ala Leu Glu Met Ser Glu Phe Trp Asn
Ala His Arg Cys Ser Ala

Figure 1c

Ala Ile Thr Pro Thr Ala Thr Gly Pro Val Gly Gly Gln Gly Thr Pro
Ala Val Asn Phe Thr Asp Tyr Ser Ser Ser Ser Leu Glu Gln Phe Trp
Asn Asp Trp Val Gly Glu Val Glu Glu Pro Pro Phe Ala Tyr Val Pro
Glu Pro Pro Asn Pro Tyr Pro Leu Pro Asn Ala Pro Pro Pro Ile Tyr
Pro Glu Tyr Tyr Thr Lys Arg Pro Lys Asp Ile Leu Pro Asp Tyr Lys
Phe Pro Lys Asp Phe Leu Phe Gly Trp Ala Thr Ala Ala Gln Gln Trp
Glu Gly Ala Val Lys Ala Asp Gly Lys Gly Pro Ser Ile Trp Asp Trp
Ala Ser Arg Phe Pro Gly Phe Ile Ala Asp Asn Thr Thr Ser Asp Val
Gly Asp Leu Gly Tyr Tyr Leu Tyr Lys Glu Asp Leu Ala Arg Ile Ala
Ala Leu Gly Ala Asn Val Tyr Ser Phe Ser Met Phe Trp Thr Arg Ile
Phe Pro Phe Gly Lys Ala Asp Ser Pro Val Asn Gln Ala Gly Ile Asp
Phe Tyr His Asp Leu Ile Asp Tyr Ser Trp Ser Leu Gly Ile Glu Pro
Val Val Thr Leu Phe His Trp Asp Thr Pro Leu Ala Leu Gln Leu Glu
Tyr Gly Gly Phe Ala Ser Glu Arg Ile Ile Asp Asp Tyr Val Asn Tyr
Ala Glu Thr Val Phe Lys Ala Tyr Asn Gly Ser Val His Lys Trp Val
Thr Phe Asn Glu Pro Val Val Phe Cys Ser Gln Met Ala Ala Pro Val
Asn Thr Thr Leu Pro Pro Asn Leu Asn Ser Thr Ile Tyr Pro Tyr Thr
Cys Ser Tyr His Leu Val Leu Ala His Ala Lys Thr Val Lys Arg Phe

Arg Glu Leu Asn Ile Gln Gly Gln Ile Ala Phe Lys Ser Asp Asn Phe
Val Gly Ile Pro Trp Arg Glu Gly Asn Gln Glu Asp Ile Asp Ala Val
Glu Arg His Gln Ala Tyr Gln Ile Gly Ile Phe Ala Glu Pro Ile Tyr
Asn Thr Gly Asp Trp Pro Asp Ile Val Lys Asn Asp Leu Ser Pro Asp
Ile Leu Pro Arg Phe Thr Asp Asp Glu Ile Ala Met Ile Lys Cys Thr
Ala Asp Phe Phe Pro Ile Asp Gly Tyr Arg Asp Gly Tyr Val Gln Ala
Val Pro Gly Gly Val Glu Ala Cys Val Ala Asn Ile Ser Asn Pro Leu
Trp Pro Ala Cys Asn Gln Val Asn Phe Tyr Asp Ser Thr Pro Ala Gly
Trp Ala Ile Gly Thr Phe Gly Asn Trp Pro Thr Thr Pro Trp Leu Gln
Asn Thr Trp Gln Phe Val Arg Pro Phe Leu Ala Asp Leu Ala Lys Arg
Tyr Pro Thr Glu Gly Gly Ile Tyr Leu Ser Glu Phe Gly Phe Ser Glu
Pro Phe Glu Asn Asp Lys Thr Phe Ile Tyr Gln Ile Thr Gln Asp Ser
Gly Arg Thr Ala Tyr Phe Asn Ser Tyr Leu Gly Glu Val Leu Lys Gly
Ile Val Glu Asp Gly Ile Pro Ile Lys Gly Val Phe Gly Trp Ser Met
Val Asp Asn Phe Glu Trp Asn Ser Gly Leu Ser Thr Arg Phe Gly Val
Gln Tyr Val Asp Tyr Asn Ser Pro Thr Arg Gln Arg Thr Phe Lys Arg
Ser Ala Leu Glu Met Ser Glu Phe Trp Asn Ala His Arg Cys Ser Ala

Figure 1d

Ala Thr Gly Pro Val Gly Gly Gln Gly Thr Pro Ala Val Asn Phe Thr
Asp Tyr Ser Ser Ser Ser Leu Glu Gln Phe Trp Asn Asp Trp Val Gly
Glu Val Glu Glu Pro Pro Phe Ala Tyr Val Pro Glu Pro Pro Asn Pro
Tyr Pro Leu Pro Asn Ala Pro Pro Pro Ile Tyr Pro Glu Tyr Tyr Thr
Lys Arg Pro Lys Asp Ile Leu Pro Asp Tyr Lys Phe Pro Lys Asp Phe
Leu Phe Gly Trp Ala Thr Ala Ala Gln Gln Trp Glu Gly Ala Val Lys
Ala Asp Gly Lys Gly Pro Ser Ile Trp Asp Trp Ala Ser Arg Phe Pro
Gly Phe Ile Ala Asp Asn Thr Thr Ser Asp Val Gly Asp Leu Gly Tyr
Tyr Leu Tyr Lys Glu Asp Leu Ala Arg Ile Ala Ala Leu Gly Ala Asn
Val Tyr Ser Phe Ser Met Phe Trp Thr Arg Ile Phe Pro Phe Gly Lys
Ala Asp Ser Pro Val Asn Gln Ala Gly Ile Asp Phe Tyr His Asp Leu
Ile Asp Tyr Ser Trp Ser Leu Gly Ile Glu Pro Val Val Thr Leu Phe
His Trp Asp Thr Pro Leu Ala Leu Gln Leu Glu Tyr Gly Gly Phe Ala
Ser Glu Arg Ile Ile Asp Asp Tyr Val Asn Tyr Ala Glu Thr Val Phe
Lys Ala Tyr Asn Gly Ser Val His Lys Trp Val Thr Phe Asn Glu Pro
Val Val Phe Cys Ser Gln Met Ala Ala Pro Val Asn Thr Thr Leu Pro
Pro Asn Leu Asn Ser Thr Ile Tyr Pro Tyr Thr Cys Ser Tyr His Leu
Val Leu Ala His Ala Lys Thr Val Lys Arg Phe Arg Glu Leu Asn Ile

Gln Gly Gln Ile Ala Phe Lys Ser Asp Asn Phe Val Gly Ile Pro Trp
Arg Glu Gly Asn Gln Glu Asp Ile Asp Ala Val Glu Arg His Gln Ala
Tyr Gln Ile Gly Ile Phe Ala Glu Pro Ile Tyr Asn Thr Gly Asp Trp
Pro Asp Ile Val Lys Asn Asp Leu Ser Pro Asp Ile Leu Pro Arg Phe
Thr Asp Asp Glu Ile Ala Met Ile Lys Cys Thr Ala Asp Phe Phe Pro
Ile Asp Gly Tyr Arg Asp Gly Tyr Val Gln Ala Val Pro Gly Gly Val
Glu Ala Cys Val Ala Asn Ile Ser Asn Pro Leu Trp Pro Ala Cys Asn
Gln Val Asn Phe Tyr Asp Ser Thr Pro Ala Gly Trp Ala Ile Gly Thr
Phe Gly Asn Trp Pro Thr Thr Pro Trp Leu Gln Asn Thr Trp Gln Phe
Val Arg Pro Phe Leu Ala Asp Leu Ala Lys Arg Tyr Pro Thr Glu Gly
Gly Ile Tyr Leu Ser Glu Phe Gly Phe Ser Glu Pro Phe Glu Asn Asp
Lys Thr Phe Ile Tyr Gln Ile Thr Gln Asp Ser Gly Arg Thr Ala Tyr
Phe Asn Ser Tyr Leu Gly Glu Val Leu Lys Gly Ile Val Glu Asp Gly
Ile Pro Ile Lys Gly Val Phe Gly Trp Ser Met Val Asp Asn Phe Glu
Trp Asn Ser Gly Leu Ser Thr Arg Phe Gly Val Gln Tyr Val Asp Tyr
Asn Ser Pro Thr Arg Gln Arg Thr Phe Lys Arg Ser Ala Leu Glu Met
Ser Glu Phe Trp Asn Ala His Arg Cys Ser Ala

Figure 2a

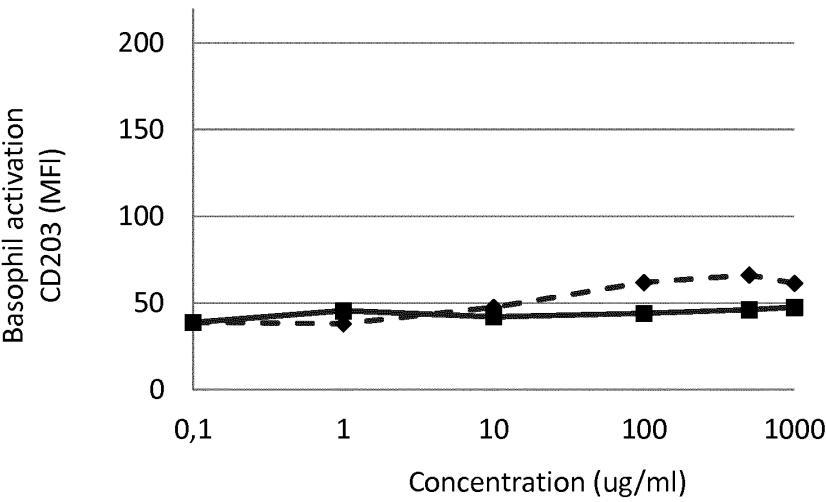


Figure 2b

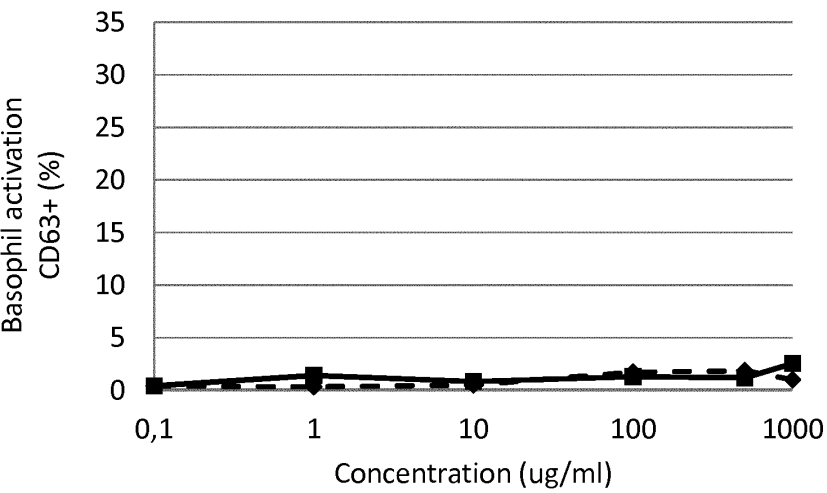


Figure 3a

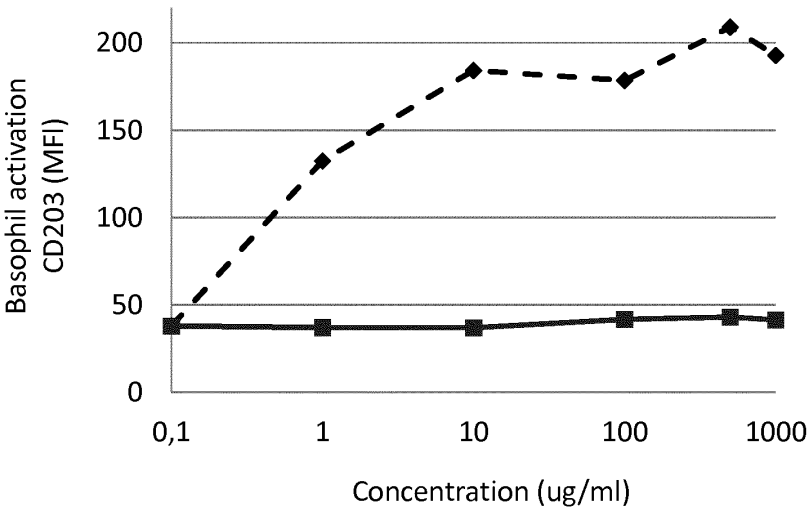


Figure 3b

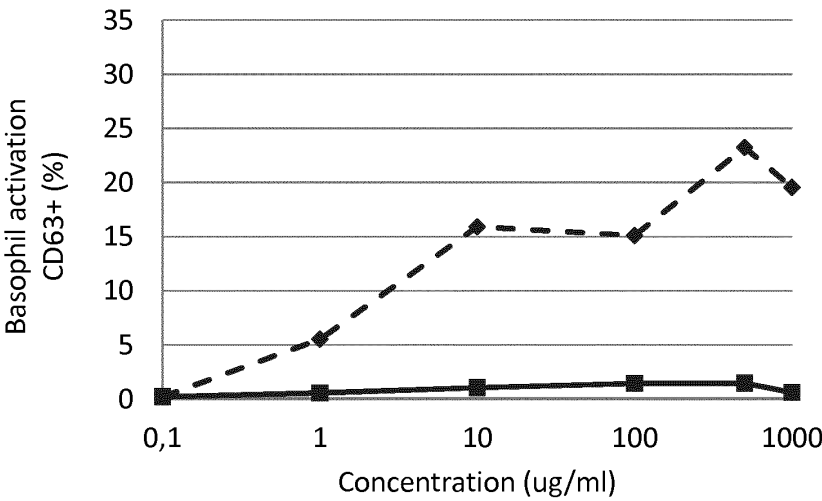


Figure 4a

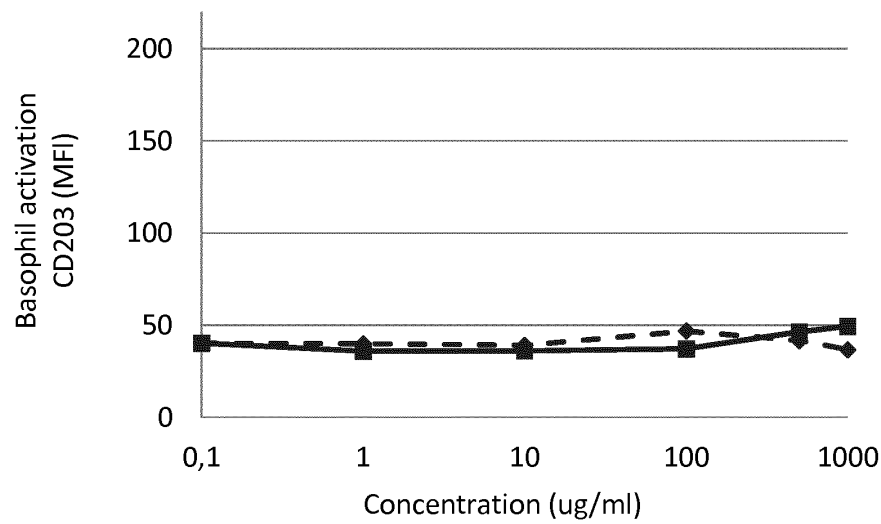


Figure 4b

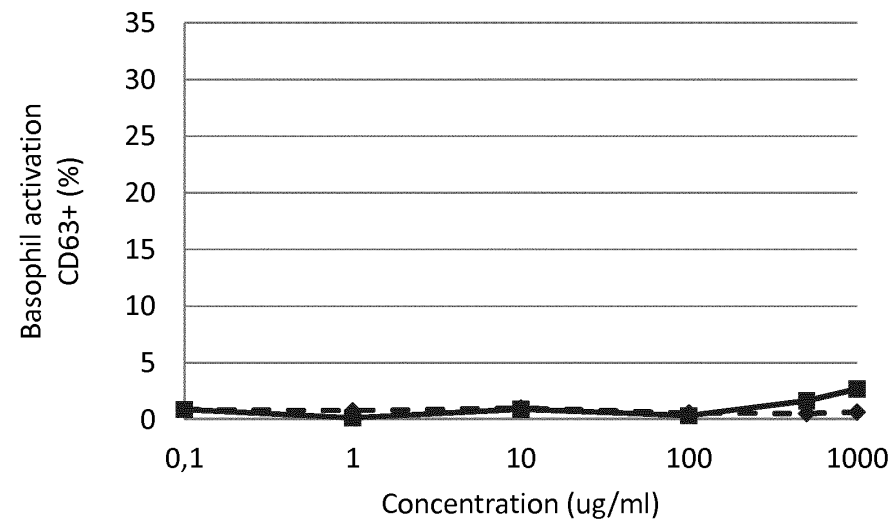


Figure 5a

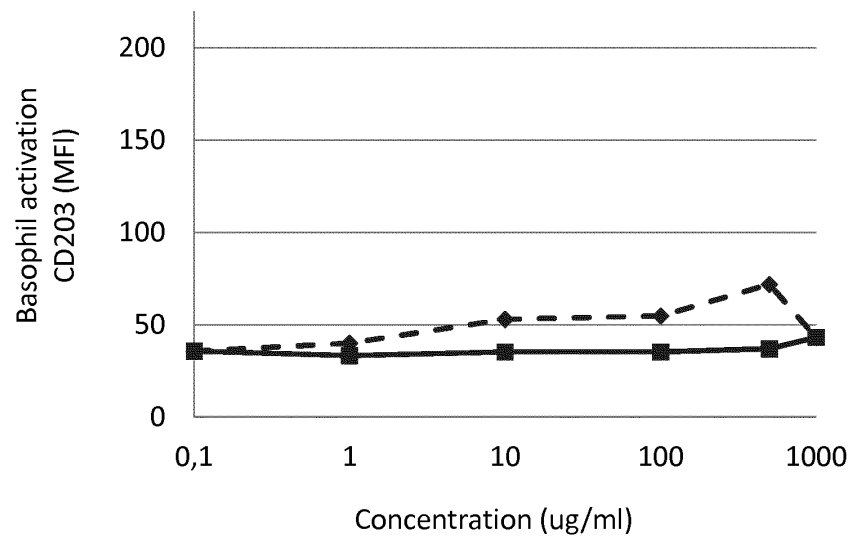


Figure 5b

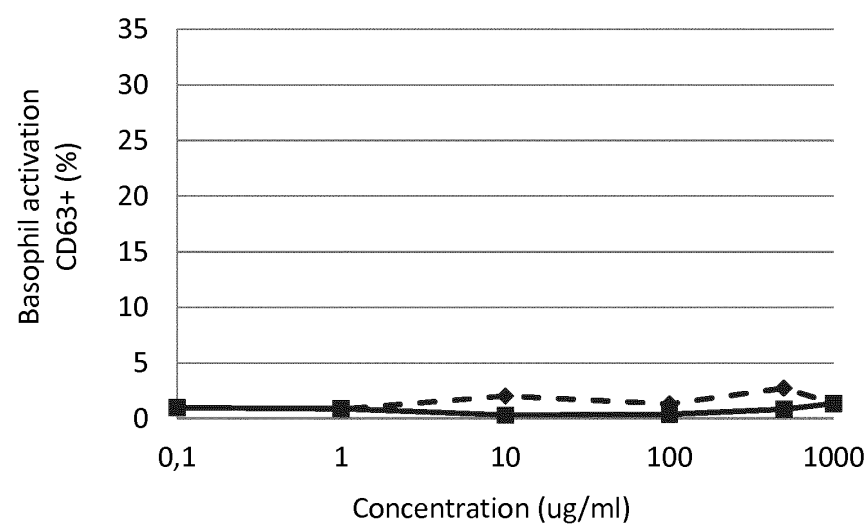


Figure 6a

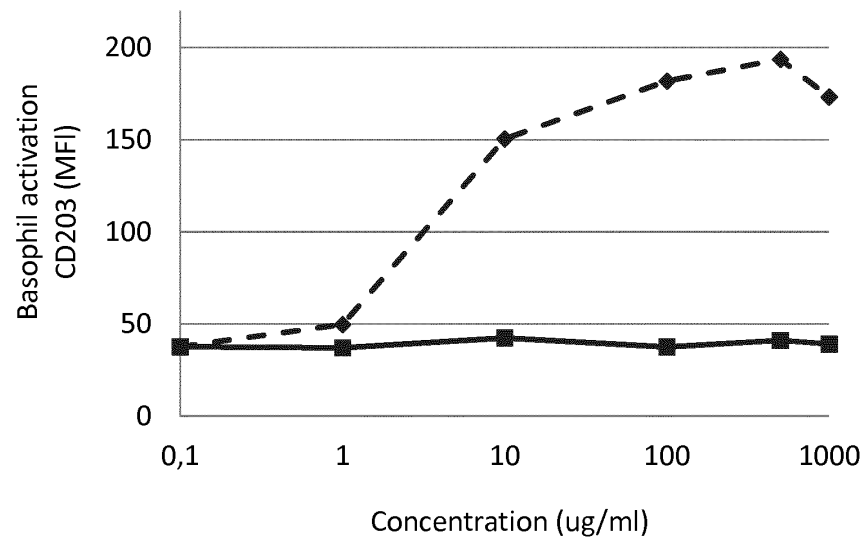


Figure 6b

