



PĪPe C- PrP»CĻ C-PSC€PĕC... P±PμC,P°-P»P°PeC,P°PjPSPĕC...  
P°PSC,PĕP±P°PeC,PμCĤC-P°P»CH̄PSPĕC... P·P°CĪPsP±C-PI, PĪPsPeP°P·PSPĕPePĕ C±P°CĪCf,  
PĪCĤPĕ CĻPePĕC... PePsPSC†PμPSC,CĤP°C†C-C— PjPμCĤPsPĪPμPSPμPjCf  
PĪPμCĤPμPIPĕC%oCfPIP°P»Pĕ PjC-PSC-PjP°P»CH̄PSC- C-PSPiC-P±CfCĤC†C-  
PePsPSC†PμPSC,CĤP°C†C-C— (PĤP†PŸ) (PŸ > PĤP†PŸ), PIPeP°P·CfPIP°P»Pĕ PSP°  
PIPĕCĪPsPePĕPNĕ CĪC,CfPĪC-PSCĤ PePsCĤPμP»CĻC†C-C— P· PμC,,PμPeC,PĕPIPSC-CĪC,CĤ.  
PĪP° PrPsPeP»C-PSC-C†PSPĕC... PjPsPrPμP»CĻC... PjPμCĤPsPĪPμPSPμPj  
PĪCĤPsPrPμPjPsPSCĪC,CĤCfPIP°PI P°PeC,PĕPIPSC-CĪC,CĤ PĪCĤPĕ  
PePsPSC†PμPSC,CĤP°C†C-CĻC... Cf PĪP»P°P·PjC- PeCĤPsPIC-, C%oPs  
PĪPμCĤPμPIPĕC%oCfPIP°P»Pĕ PĤP†PŸ PrP»CĻ C-PSC,,C-PeCfCĤC†PĕC...  
PjC-PeCĤPsPsCĤPĪP°PSC-P·PjC-PI PĪCĤPĕP±P»PĕP·PSPs PSP° 40 % PIC-Pr C-PSC,PμCĤPIP°P»Cf  
PrPsP·CfPIP°PSPSCĻ. PĪPμ C†C-P»CH̄PsPIPμ P·PSP°C†PμPSPSCĻ PSPμ P±CfP»Ps  
PICĪC,P°PSPsPIP»PμPSPs PeP»C-PSC-C†PSPs.

P°P°PeC,PμCĤC-P°P»CH̄PSP° CĤPμP·PĕCĪC,PμPSC,PSC-CĪC,CĤ PrPs PjPμCĤPsPĪPμPSPμPjCf  
PjPsP¶Pμ PIPĕPSPĕPePSCfC,Pĕ Cf CĤPμP·CfP»CH̄C,P°C,C-: (1) P·PSPĕP¶PμPSPSCĻ  
PĪCĤPsPSPĕPePSPsCĪC,C- P·PsPIPSC-C€PSCĤPsC— PjPμPjP±CĤP°PSPĕ  
PĪCĤP°PjPSPμPĪP°C,PĕPIPSPĕC... P±P°PeC,PμCĤC-PNĕ (Cf P·PIBĤ™ CĻP·PeCf P·C-  
P·PSPĕP¶PμPSPSCĻPj PĪCĤPsPrCfPeCfPIP°PSPSCĻ PĪPsCĤPĕPSC-PI), (2) P·PSPĕP¶PμPSPSCĻ  
CĪPĪPsCĤC-PrPSPμPSPsCĪC,C- P· C†C-P»CH̄PsPIPĕPjPĕ PBP, (3) PĪC-PrPIPĕC%oPμPSPSCĻ  
PμPeCĪPĪCĤPμCĪC-C— PePsPjPĪPsPSPμPSC,C-PI PμC,,P»CĤPeCĪPSPsPĪPs PSP°CĪPsCĪP° C,P° (4)  
PĪCĤPsPrCfPeCfPIP°PSPSCĻ P±PμC,P°-P»P°PeC,P°PjP°P·, CĻPeC- PjPsP¶CfC,CĤ  
PĪC-PrCĤPsP»C-P·CfPIP°C,Pĕ PeP°CĤP±P°PĪPμPSPμPjPĕ.

PJ P,,PICĤPsPĪPμPNĕCĪCH̄PePsPjCf PŸPsCĤP·C- P±CfP»Pĕ P·P°CĤPμC”CĪC,CĤPsPIP°PSC-  
PIPsiPSPĕC%oP° C-PSC,,PμPeC†C-C—, CĪPĪCĤPĕC†PĕPSPμPSC- P±P°PeC,PμCĤC-CĻPjPĕ,  
CĪC,C-PNĕPePĕPjPĕ PrPs PeP°CĤP±P°PĪPμPSPμPjC-PI.

PμPμCĤPμC...CĤPμCĪPSP° CĤPμP·PĕCĪC,PμPSC,PSC-CĪC,CĤ PjC-P¶ PjPμCĤPsPĪPμPSPμPjPsPj  
C- P»C-PeP°CĤCĪCH̄PePĕPjPĕ P·P°CĪPsP±P°PjPĕ, C%oPs PSP°P»PμP¶P°C,CĤ PrPs PeP»P°CĪC-PI  
C...C-PSPsP»PsPSC-PI, P°PjC-PSPsPĪP»C-PePsP·PĕPrC-PI, PjP°PeCĤPsP»C-PrC-PI C,P°  
C,PμC,CĤP°C†PĕPeP»C-PSC-PI, P· CfCĤP°C...CfPIP°PSPSCĻPj C†C-P»CH̄PsPIPĕC...  
PjC-PeCĤPsPsCĤPĪP°PSC-P·PjC-PI PIC-PrCĪCfC,PSCĻ. PĤPrPSP°Pe P±P°PeC,PμCĤC-C—  
PjPsP¶CfC,CĤ PĪCĤPsCĻPIP»CĻC,Pĕ CĤPμP·PĕCĪC,PμPSC,PSC-CĪC,CĤ PrPs P±C-P»CH̄C€  
PSC-P¶ PsPrPSPsPĪPs PeP»P°CĪCf P°PSC,PĕP±P°PeC,PμCĤC-P°P»CH̄PSPĕC...  
PĪCĤPμPĪP°CĤP°C,C-PI Cf PIPĕPĪP°PrPeCf, PePsP»Pĕ P·P°P»CfC†PμPSPĕPNĕ PrPs PrC-C—  
PjPμC...P°PSC-P·Pj PIPeP»CĤC†P°C” PSPμPĪCĤPsPSPĕPePSC-CĪC,CĤ PjPμPjP±CĤP°PSPĕ  
PeP»C-C,PĕPS C,P°/P°P±Ps PSP°CĻPIPSC-CĪC,CĤ PμC,,P»CĤPeCĪPSPsPĪPs(-PĕC...)  
PSP°CĪPsCĪP°(PSP°CĪPsCĪC-PI).

P”CĤP°PSPĕC†PSC- P·PSP°C†PμPSPSCĻ PĤP†PŸ, C%oPs P±CfP»Pĕ PIPĕP·PSP°C†PμPSC- Cf  
PĪCĤPsC†PμCĪC- PeP»C-PSC-C†PSPĕC... PrPsCĪP»C-PrP¶PμPSCĤ P,,PICĤPsPĪPμPNĕCĪCH̄PePĕPj  
PePsPjC-C,PμC,PsPj P· PIPĕP·PSP°C†PμPSPSCĻ C†CfC,P»PĕIPsCĪC,C- PrPs  
PĪCĤPsC,PĕPjC-PeCĤPsP±PSPĕC... PĪCĤPμPĪP°CĤP°C,C-PI (EUCAST), PSP°PIPμPrPμPSC- P·P°  
PĪPsCĪPĕP»P°PSPSCĻPj [https://www.ema.europa.eu/documents/other/minimum-inhibitory-concentration-mic-breakpoints\\_en.xlsx](https://www.ema.europa.eu/documents/other/minimum-inhibitory-concentration-mic-breakpoints_en.xlsx).

PμPsC€PĕCĤPμPSC-CĪC,CĤ PSP°P±CfC,PsC— CĤPμP·PĕCĪC,PμPSC,PSPsCĪC,C- PjPsP¶Pμ  
P·PjC-PSCĤPIP°C,PĕCĪCĻ PĪPμPsPĪCĤP°C,,C-C†PSPs C,P° Cf C†P°CĪC- PrP»CĻ PsPeCĤPμPjPĕC...  
PIPĕPrC-PI, C,PsPjCf P±P°P¶P°PSPs CĪPĪPĕCĤP°C,PĕCĪCĻ PSP° PjC-CĪC†PμPICf  
C-PSC,,PsCĤPjP°C†C-CĤ PĪCĤPs CĤPμP·PĕCĪC,PμPSC,PSC-CĪC,CĤ  
PjC-PeCĤPsPsCĤPĪP°PSC-P·PjC-PI, PsCĪPsP±P»PĕIPs PĪCĤPĕ P»C-PeCfPIP°PSPSC-

C, CИP¶PePëC... C-PSC,, PµPeC†C-PNё. PJ CЪP°P·C- PSpµPsP±C...C-PrPSPsC†C,C-, PePsP»Pë CЪC-PIPµPSCН PİPsC€PëCЪPµPSPsC†C,C- CЪPµP·PëC†C,PµPSC,PSPsC†C,C- PjC-PeCЪPsPsCЪPiP°PSC-P·PjC-PI PSP° PjC-C†C†PµPIPjC† CЪC-PIPSC- C” C,P°PePëPj, C%oPs PePsCЪPëC†C,CН PIC-Pr P·P°C†C,PsC†C†PIP°PSPSCИ P»C-PeP°CЪC†CНPePsPiPs P·P°C†PsP±C†, PiCЪPëPSP°PNёPjPSC- PiPs PIC-PrPSPsC€PµPSPSCН PrPs PrPµCИPePëC... PIPëPrC-PI C-PSC,, PµPeC†C-PNё, PIPëPeP»PëPeP°C” C†C†PjPSC-PIPë, C†P»C-Pr P·PIPµCЪPSC†C,PëC†CИ P·P° PePsPSC†C†P»CНC,P°C†C-C”CН PrPs PµPeC†PiPµCЪC,P°.

PќPëP¶C†Pµ PiPµCЪPµCЪP°C...PsPIC†CНC,CНC†CИ PiP°C,PsPiPµPSPSC- PjC-PeCЪPsPsCЪPiP°PSC-P·PjPë, PIPëC...PsPrCИC†Pë P· PeP»C-PSC-C†PSPsPiPs PrPsC†PIC-PrC† C- C,PµCЪP°PiPµPIC,PëC†PSPëC... PiCЪPsC,PsPePsP»C-PI P»C-PeC†PIP°PSPSCИ P·P°C...PIPµCЪCНPIP°PSCН.

P—P°P·PIPëC†P°PNё C†C†C,P»PëPIC- PIPëPrPë

P“CЪP°PjPiPsP·PëC,PëPIPSC- P°PµCЪPsP±Pë: *Enterococcus faecalis*<sup>7</sup>; *Staphylococcus aureus* (PjPµC,PëC†PëP»C-PSC†C†C,P»PëPIPëPNё)<sup>8</sup>; *Staphylococcus species* (PjPµC,PëC†PëP»C-PSC†C†C,P»PëPIPëPNё), C† C,PsPjC† C†PëC†P»C- *Staphylococcus epidermidis*, *Streptococcus agalactiae* (PiCЪC†PiP° P’); PiCЪC†PiP° *Streptococcus milleri* (*S.anginosus*, *S.constellatus* C,P° *S.intermedius*), *Streptococcus pneumoniae*, *Streptococcus pyogenes* (PiCЪC†PiP° Pђ).

P“CЪP°PjPSPµPiP°C,PëPIPSC- P°PµCЪPsP±Pë: *Citrobacter freundii*, *Citrobacter koseri*, *Enterobacter aerogenes*, *Enterobacter cloacae*, *Escherichia coli*, *Haemophilus influenzae*, *Klebsiella oxytoca*, *Klebsiella pneumoniae*, *Morganella morganii*, *Neisseria meningitides*, *Proteus mirabilis*, *Proteus vulgaris*, *Serratia marcescens*.

P“CЪP°PjPiPsP·PëC,PëPIPSC- P°PSP°PµCЪPsP±Pë: *Clostridium perfringens*, *Peptoniphilusaccharolyticus*, *Peptostreptococcus species* (C† C,PsPjC† C†PëC†P»C- *P.micros*, *P.anaerobius*, *P.magnus*).

P“CЪP°PjPSPµPiP°C,PëPIPSC- P°PSP°PµCЪPsP±Pë: *Bacteroides caccae*; PiCЪC†PiP° *Bacteroides fragilis*, *Prevotella bivia*, *Prevotella disiens*.

P’PëPrPë, PrP»CИ CИPePëC... PSP°P±C†C,P° CЪPµP·PëC†C,PµPSC,PSC-C†C,CН PjPsP¶Pµ P±C†C,Pë PiCЪPsP±P»PµPjPsCН

P“CЪP°PjPiPsP·PëC,PëPIPSC- P°PµCЪPsP±Pë: *Enterococcus faecium*<sup>7,9</sup>.

P“CЪP°PjPSPµPiP°C,PëPIPSC- P°PµCЪPsP±Pë: *Acinetobacter species*, *Burkholderia cepacia*, *Pseudomonas aeruginosa*.

P—P° C†PIPµC”CН PiCЪPëCЪPsPrPsCН CЪPµP·PëC†C,PµPSC,PSC-  
PjC-PeCЪPsPsCЪPiP°PSC-P·PjPë

P“CЪP°PjPSPµPiP°C,PëPIPSC- P°PµCЪPsP±Pë: *Stenotrophomonas maltophilia*, *Legionella species*.

P†PSC€C- PjC-PeCЪPsPsCЪPiP°PSC-P·PjPë: *Chlamydomphila pneumoniae*, *Chlamydomphila psittaci*, *Coxiella burnetii*, *Mycoplasma pneumoniae*.

<sup>7</sup>P’PëPrPë, CИPeC- PIPëCИPIPëP»Pë PiCЪPëCЪPsPrPSC† PiCЪPsPjC-P¶PSC† C†C†C,P»PëPIC-C†C,CН.

<sup>8</sup> PjCfC- PjPμC, PēC†PēP»C-PSC<sub>7</sub>PμP·PēCfC, PμPSC, PSC- CfC, P°C, „C-P»PsPePsPePē C”  
C<sub>7</sub>PμP·PēCfC, PμPSC, PSpēPjPē PrPs PjPμC<sub>7</sub>PsPīPμPSPμPjCf.

<sup>9</sup> PμPsPeP°P·PSPēPe C<sub>7</sub>PμP·PēCfC, PμPSC, PSPsCfC, C- > 50 % PI PsPrPSC-PNē P°P±Ps  
PeC-P»CHPePsC... PeC<sub>7</sub>P°C—PSP°C... P,,PŸ.

PŸP°Pī C- PjPμP»C-PsC—PrPsP·: P·P°CfC, PsCfCfPīP°PSPSC<sub>7</sub> PjPμC<sub>7</sub>PsPīPμPSPμPjCf Cf  
P»CHPrPμPNē PīC<sub>7</sub>CfPSC, CfC”C, CHCfC<sub>7</sub> PSP° PrP°PSPēC... PīC<sub>7</sub>Ps C†CfC, P»PēPIC-CfC, CH  
*B. mallei* C- *B. pseudomallei* in vitro C- PSP° PsP±PjPμP<sub>7</sub>PμPSPēC... PrP°PSPēC... Cf  
P»CHPrPμPNē. P>C-PeP°C<sub>7</sub>C- PīPsPīPēPSPSC- CfPīPēC<sub>7</sub>P°C, PēCfC<sub>7</sub> PSP°  
PSP°C†C-PsPSP°P»CHPSC- C, P°/P°P±Ps PjC-P<sub>7</sub>PSP°C<sub>7</sub>PsPrPSC- PePsPSCfPμPSCfCfCfPSC-  
PrPsPeCfPjPμPSC, Pē, C%Ps CfC, PsCfCfC<sub>7</sub>C, CHCfC<sub>7</sub> P»C-PeCfPīP°PSPSC<sub>7</sub> CfP°PīCf C-  
PjPμP»C-PsC—PrPsP·Cf.

PαP°C<sub>7</sub>PjP°PePsPeC-PSPμC, PēPeP°.

Pj P·PrPsC<sub>7</sub>PsPīPēC... PrPsP±C<sub>7</sub>PsPīPsP»CHC†C-PI CfPμC<sub>7</sub>PμPrPSC-PNē PīPμC<sub>7</sub>C-PsPr  
PSP°PīC-PIPīPēPīPμPrPμPSPSC<sub>7</sub> P· PīP»P°P·PjPē PeC<sub>7</sub>PsPIC- CfC, P°PSPsPīPēC, CH  
PīC<sub>7</sub>PēP±P»PēP·PSPs 1 PīPsPrPēPSCf; CfPμC<sub>7</sub>PμPrPSC-PNē PsP±B<sub>7</sub>™ C”Pj C<sub>7</sub>PsP·PīPsPrC-P»Cf  
CfC, P°PSPsPīPēC, CH PīC<sub>7</sub>PēP±P»PēP·PSPs 0,25 P»/PePī (11-27 P»); CfPμC<sub>7</sub>PμPrPSC-PNē  
PeP»C-C<sub>7</sub>PμPSCf CfC, P°PSPsPīPēC, CH 287 PjP»/C...PI PīC<sub>7</sub>Pē P·P°CfC, PsCfCfPīP°PSPSC-  
PīC<sub>7</sub>PμPīP°C<sub>7</sub>P°C, Cf PI PrPsP·C- 250 PjPī, P·C- P·PSPēP<sub>7</sub>PμPSPSC<sub>7</sub>Pj PeP»C-C<sub>7</sub>PμPSCfCf PrPs  
205 PjP»/C...PI PīC<sub>7</sub>Pē P·P°CfC, PsCfCfPīP°PSPSC- PīC<sub>7</sub>PμPīP°C<sub>7</sub>P°C, Cf Cf PrPsP·C- 2 Pī.  
P”PsP·Pē PīC<sub>7</sub>PμPīP°C<sub>7</sub>P°C, Cf 500, 1000 C- 2000 PjPī, PīPīPμPrPμPSC- Cf PīPēPīP»C<sub>7</sub>PrC-  
C-PSC, „CfP·C-C— PīC<sub>7</sub>PsC, C<sub>7</sub>PīPsPj 30 C...PīPēP»PēPS, PrP°C<sub>7</sub>C, CH CfPμC<sub>7</sub>PμPrPSC-  
P·PSP°C†PμPSPSC<sub>7</sub> C<sub>max</sub> PīC<sub>7</sub>PēP±P»PēP·PSPs 23, 49 C- 115 PjPePī/PjP» PIC-PrPīPsPIC-PrPSPs;  
PIC-PrPīPsPIC-PrPSC- P·PSP°C†PμPSPSC<sub>7</sub> AUC CfC, P°PSPsPīP»C<sub>7</sub>C, CH 39,3, 62,3 C-  
153 PjPePī×PīPsPr/PjP». PμC-CfP»C<sub>7</sub> PīC<sub>7</sub>PsPīPμPrPμPSPSC<sub>7</sub> C-PSC, „CfP·C-C—  
PīC<sub>7</sub>PμPīP°C<sub>7</sub>P°C, Cf Cf PrPsP·P°C... 500 C- 1000 PjPī PīC<sub>7</sub>PsC, C<sub>7</sub>PīPsPj 5  
C...PīPēP»PēPS P·PSP°C†PμPSPSC<sub>7</sub> C<sub>max</sub> CfC, P°PSPsPīP»C<sub>7</sub>C, CH 52 C- 112 PjPePī/PjP»  
PIC-PrPīPsPIC-PrPSPs. PμC<sub>7</sub>Pē PīPīPμPrPμPSPSC- PeC-P»CHPePsC... PrPsP·  
PīC<sub>7</sub>PμPīP°C<sub>7</sub>P°C, Cf PePsP<sub>7</sub>PSC- 8 PīPsPrPēPS PīP°C†C-C”PSC, P°Pj P·  
PSPsC<sub>7</sub>PjP°P»CHPSPsC<sub>7</sub> C, „CfPSPeC†C-C”C<sub>7</sub> PSPēC<sub>7</sub>PsPe PeCfPjCfP»C<sub>7</sub>C†C-C—  
PjPμC<sub>7</sub>PsPīPμPSPμPjCf PSPμ CfPīPsCfC, PμC<sub>7</sub>C-PīP°P»PsCfC<sub>7</sub>.

P’ PīC<sub>7</sub>PsC†PμCfC- PrPsCfP»C-PrP<sub>7</sub>PμPSPSC<sub>7</sub> P· CfC†P°CfC, C<sub>7</sub> 12 PīP°C†C-C”PSC, C-PI,  
C<sub>7</sub>PePēPj PīPīPsPrPēP»Pē PjPμC<sub>7</sub>PsPīPμPSPμPj PīPs 1000 PjPī PePsP<sub>7</sub>PSC- 8 PīPsPrPēPS  
PīC-CfP»C<sub>7</sub> C...C-C<sub>7</sub>CfC<sub>7</sub>PīC-C†PSPsC— PsPīPμC<sub>7</sub>P°C†C-C— P· PīC<sub>7</sub>PēPīPsPrCf  
C-PSC, C<sub>7</sub>P°P°P±PrPsPjC-PSP°P»CHPSPsC— C-PSC, „PμPeC†C-C—, P±CfP»Pē PīPēC<sub>7</sub>PīP»PμPSC-  
P·PSP°C†PμPSPSC<sub>7</sub> PīPsPeP°P·PSPēPeC-PI C<sub>max</sub> C- PīPμC<sub>7</sub>C-PsPrCf  
PSP°PīC-PIPīPēPīPμPrPμPSPSC<sub>7</sub>, C<sub>7</sub>PeC- PIC-PrPīPsPIC-PrP°C<sub>7</sub>C, CH PīPsPeP°P·PSPēPeP°Pj  
P·PrPsC<sub>7</sub>PsPīPēC... P»CHPrPμPNē, P°P»Pμ PsP±B<sub>7</sub>™ C”Pj C<sub>7</sub>PsP·PīPsPrC-P»Cf P±CfPI  
P±C-P»CHCēPēPj (27 P»).

P PsP·PīPsPrC-P»

PŸPμC<sub>7</sub>PμPrPSC” P·PSP°C†PμPSPSC<sub>7</sub> P·PīB<sub>7</sub>™ C<sub>7</sub>P·CfPīP°PSPSC<sub>7</sub> PjPμC<sub>7</sub>PsPīPμPSPμPjCf P·  
P±C-P»PeP°PjPē PīP»P°P·PjPē PeC<sub>7</sub>PsPIC- CfC, P°PSPsPīPēP»Ps PīC<sub>7</sub>PēP±P»PēP·PSPs  
2 % C- PSPμ P·P°P»PμP<sub>7</sub>P°P»Ps PIC-Pr PePsPSC†PμPSC, C<sub>7</sub>P°C†C-C—  
PīC<sub>7</sub>PμPīP°C<sub>7</sub>P°C, Cf. PμC-CfP»C<sub>7</sub> CēPīPēPrPePsPīPs PīPīPμPrPμPSPSC<sub>7</sub>

PiC7PmPiP°C7P°C,Cr (5 C...PIPëP»PëPS P°P±Ps PjPmPSC€Pm)  
C,,P°C7PjP°PePsPeC-PSPmC,PëPeP° C” P±C-PmPeC7PmPSPmPSC†C-P°P»CHPSPsC7,  
P°P»Pm C†Pm C7C,P°C” PSP°P±P°PiP°C,Ps PjPmPSC€ PsC†PmPIPëPrPSPëPj PiC-C7P»C7  
30-C...PIPëP»PëPSPSPsC— C-PSC,,CrP·C-C—. P’C7P»Ps PIPëC7PIP»PmPSPs, C%oPs  
PjPmC7PsPiPmPSPmPj PrPsP±C7Pm PiC7PsPSPëPeP°C” Cr PrPmC7PmC- C7C-PrPëPSPë  
C,P° C,PeP°PSPëPSPë PsC7PiP°PSC-P·PjCr, PIPeP»C7C†P°C7C†Pë P»PmPiPmPSC-,  
P±C7PsPSC...C-P°P»CHPSPëPNë C7PmPeC7PmC,, P7PSPIC†, C7PmPëPSPSPsPjPsP·PePsPICr  
C7C-PrPëPSCr, C,PeP°PSPëPSPë C7C,P°C,PmPIPëC... PsC7PiP°PSC-PI P7C-PSPePë,  
C€PeC-C7Cr, C,,P°C7C†C-C—, PjB7™ C7P·Pë C- PiPmC7PëC,PsPSPmP°P»CHPSPëPNë  
PmPeC7C7PrP°C,.

P7PmC,P°P±PsP»C-P·Pj

P7PmC7PsPiPmPSPmPj PjPmC,P°P±PsP»C-P·C7C”C,CHC7C7C7 C€P»C7C...PsPj PiC-PrC7PsP»C-P·C7  
P±PmC,P°-P»P°PeC,P°PjPSPsPiPs PeC-P»CHC†C7 P· C7C,PIPSC7PmPSPSC7Pj  
PjC-PeC7PsP±C-PsP»PsPiC-C†PSPs PSPmP°PeC,PëPIPSPsPiPs PjPmC,P°P±PsP»C-C,Cr. *In vitro*  
PjPmC7PsPiPmPSPmPj PrPmPjPsPSC7C,C7CrC” P·PSPëP7PmPSCr  
C7PmC7PëPNëPSC7C,P»PëPIC-C7C,CH PrPs PiC-PrC7PsP»C-P·C7 P»C7PrC7CHPePsC7  
PrPmPiC-PrC7PsPiPmPiC,PëPrP°P·PsC7-P† (P”P”Pm-P†) PiPsC7C-PIPSC7PSPs P·  
C-PjC-PiPmPSPmPjPsPj, C,PsPjCr PiPsC,C7PmP±Pë PI PsPrPSPsC†P°C7PSPsPjCr  
P·P°C7C,PsC7C7PIP°PSPSC- C-PSPIC-P±C-C,PsC7P° P”P”Pm-P† PSPmPjP°C”.

P’PëPIPmPrPmPSPSC7

P7PmC7PsPiPmPSPmPj PiPmC7PmPIP°P7PSPs PIPëPIPsPrPëC,CHC7C7C7 Cr  
PSPmP·PjC-PSPmPSPsPjCr PIPëPiP»C7P7C- PSPëC7PeP°PjPë; PiC7PëP±P»PëP·PSPs 70 %  
(50-75 %) PrPsP·Pë PiC7PmPiP°C7P°C,Cr PIPëPIPsPrPëC,CHC7C7C7 Cr PSPmP·PjC-PSPmPSPsPjCr  
PIPëPiP»C7P7C- PiC7PsC,C7PiPsPj 12 PiPsPrPëPS. P©Pm 28 % PIPëPrC-P»C7C”C,CHC7C7C7 Cr  
PIPëPiP»C7P7C- PjC-PeC7PsP±C-PsP»PsPiC-C†PSPs PSPmP°PeC,PëPIPSPsPiPs  
PjPmC,P°P±PsP»C-C,Cr. P’PëPIPmPrPmPSPSC7 P· PeP°P»PsPj C7PeP»P°PrP°C” P»PëC€Pm  
PiC7PëP±P»PëP·PSPs 2 % PrPsP·Pë. P’PëPjC-C7C7PSPëPNë PSPëC7PePsPIPëPNë  
PeP»C-C7PmPSC7 C,P° PmC,,PmPeC, PiC7PsP±PmPSPmC†PëPrCr PiPsPeP°P·C7C7C,CH, C%oPs  
PjPmC7PsPiPmPSPmPj PiC-PrPrP°C”C,CHC7C7C7 C7Pe C,,C-P»CHC,C7P°C†C-C—, C,P°Pe C-  
PeP°PSP°P»CHC†PmPIC-PNë C7PmPeC7PmC†C-C—.

PkPëC7PePsPIP° PSPmPrPsC7C,P°C,PSC-C7C,CH

PmPsC7C7C€PmPSPSC7 C,,C7PSPeC†C-C— PSPëC7PsPe PiC7PëP·PIPsPrPëC,CH PrPs  
PiC-PrPIPëC%oPmPSPSC7 PiPsPeP°P·PSPëPeC-PI AUC Cr PiP»P°P·PjC- PeC7PsPIC- C-  
P·P±C-P»CHC€PmPSPSC7 PiPmC7C-PsPrCr PSP°PiC-PIPIPëPIPmPrPmPSPSC7  
PjPmC7PsPiPmPSPmPjCr. P7PiPsC7C,PmC7C-PiP°P»PsC7C7 P·P±C-P»CHC€PmPSPSC7 AUC Cr  
2,4 C7P°P·P° Cr PiP°C†C-C”PSC,C-PI P· PiPsPjC-C7PSPëPj PiPsC7C7C€PmPSPSC7Pj  
C,,C7PSPeC†C-C— PSPëC7PsPe (PeP»C-C7PmPSC7 PeC7PmP°C,PëPSC-PSCr (P7P7)  
33-74 PjP»/C...PI), Cr 5 C7P°P·C-PI B7” PiC7Pë C,C7P7PePëC...  
PiPsC7C7C€PmPSPSC7C... C,,C7PSPeC†C-C— PSPëC7PsPe (P7P7 4-23 PjP»/C...PI) C- PI  
10 C7P°P·C-PI B7” Cr PiP°C†C-C”PSC,C-PI, C7PeC- PiPmC7PmP±C7PIP°C7C,CH PSP°  
PiPmPjPsPrC-P°P»C-P·C- (P7P7 < 2 PjP»/C...PI), PiPsC7C-PIPSC7PSPs P·C-  
P·PrPsC7PsPIPëPjPë PrPsP±C7PsPIPsP»CHC†C7PjPë (P7P7 > 80 PjP»/C...PI). AUC  
PjC-PeC7PsP±C-PsP»PsPiC-C†PSPs PSPmP°PeC,PëPIPSPsPiPs PjPmC,P°P±PsP»C-C,Cr P·  
PIC-PrPeC7PëC,PëPj PeC-P»CHC†PmPj C,P°PePsP7 P·PSP°C†PSPs

РiС-РrPIPëC%oCрPIP°PICГCЦ Cр PïP°C†C-C"PSC,C-PI P· PïPsCГCрC€PµPSPSCЦPj C,,CрPSPeC†C-C— PSPëCГPsPe. PлPsCГPµPeC†C-CЦ PrPsP·Pë PïCГPµPïP°CГP°C,Cр CГPµPePsPjPµPSPrCрC"С,СГCГCЦ PïP°C†C-C"PSC,P°Pj P· PïPsPjC-CГPSPëPj C,P° C,CЦP¶PePëPj PïPsCГCрC€PµPSPSCЦPj C,,CрPSPeC†C-C— PSPëCГPsPe (PrPëPI. CГPsP·PrC-P» B«PÿPïPsCГC-P± P·P°CГC,PsCГCрPIP°PSPSCЦ C,P° PrPsP·PëB»).

РµPµCГPsPïPµPSPµPj PIPëPIPsPrPëC,СГCГCЦ C€P»CЦC...PsPj PiPµPjPsPrC-P°P»C-P·Cр, PïCГPë C†CГPsPjCр PeP»C-CГPµPSCГ PïC-Pr C±P°CГ PïCГPsPIPµPrPµPSPSCЦ PiPµPjPsPrC-P°P»C-P·Cр P±CрPI PïCГPëP±P»PëP·PSPs PI 4 CГP°P·Pë PIPëC%oPëPNë, PSC-P¶ Cр PïP°C†C-C"PSC,C-PI P· P°PSCрCГC-C"СГ.

РµPµC±C-PSPePsPIP° PSPµPrPsCГC,P°C,PSC-CГC,СГ

P"PsCГP»C-PrP¶PµPSPSCЦ P· CрC±P°CГC,СГ PïP°C†C-C"PSC,C-PI P· P°P»PePsPiPsP»СГPSPëPj C†PëCГPsP·PsPj PïPµC±C-PSPePë PïPsPeP°P·CрC" PIC-PrCГCрC,PSC-CГC,СГ PIPïP»PëPICр P·P°C...PIPсCГCГPIP°PSPSCЦ PïPµC±C-PSPePë PSP° C,,P°CГPjP°PePsPeC-PSPµC,PëPeCр PjPµCГPsPïPµPSPµPjCр PïC-CГP»CЦ P·P°CГC,PsCГCрPIP°PSPSCЦ PïPsPIC,PsCГPSPëC... PrPsP· PïCГPµPïP°CГP°C,Cр.

P"PsCГPsCГP»C- PïP°C†C-C"PSC,Pë

PαP°CГPjP°PePsPeC-PSPµC,PëC±PSC- PrPsCГP»C-PrP¶PµPSPSCЦ, PïCГPsPIPµPrPµPSC- P· CрC±P°CГC,СГ PïP°C†C-C"PSC,C-PI, PSPµ PIPëCЦPIPëP»Pë P·PSP°C±PSPëC... C,,P°CГPjP°PePsPeC-PSPµC,PëC±PSPëC... PIC-PrPjC-PSPSPsCГC,PµPNë PïPsCГC-PIPSCЦPSPs P·C- P·PrPsCГPsPIPëPjPë PrPsP±CГPsPIPsP»СГC†CЦPjPë P· P°PSP°P»PsPiC-C±PSPsСГ C,,CрPSPeC†C-C"СГ PSPëCГPsPe. PµPsPïCрP»CЦC†C-PNëPSP° PjPsPrPµP»СГ, CГPsP·CГPsP±P»PµPSP° PSP° PsCГPSPsPIC- PrP°PSPëC... 79 PïP°C†C-C"PSC,C-PI P· C-PSC,CГP°P°P±PrPsPjC-PSP°P»СГPSPsСГ C-PSC,,PµPeC†C-C"СГ P°P±Ps PïPSPµPIPjPsPSC-C"СГ, PïPsPeP°P·P°P»P° P·P°P»PµP¶PSC-CГC,СГ C†PµPSC,CГP°P»СГPSPsPiPs PsP±BГ™ C"PjCр CГPsP·PïPsPrC-P»Cр PIC-Pr PjP°CГPë C,C-P»P° C- PeP»C-CГPµPSCГCр PIC-Pr PeP»C-CГPµPSCГCр PeCГPµP°C,PëPSC-PSCр C- PIC-PeCр.

P"C-C,Pë

PαP°CГPjP°PePsPeC-PSPµC,PëC±PSC- PrPsCГP»C-PrP¶PµPSPSCЦ Cр PSPµPjPsPIP»CЦC, C- PrC-C,PµPNë P· C-PSC,,PµPeC†C-C"СГ PïCГPë P·P°CГC,PsCГCрPIP°PSPSC- PïCГPµPïP°CГP°C,Cр Cр PrPsP·P°C... 10, 20 C- 40 PjPi/PePi PïCГPsPrPµPjPsPSCГC,CГCрPIP°P»Pë P·PSP°C±PµPSPSCЦ C<sub>max</sub>, C%oPs PSP°P±P»PëP¶P°CГC,СГCГCЦ PrPs P·PSP°C±PµPSCСГ Cр PrPsCГPsCГP»PëC... PïC-CГP»CЦ P·P°CГC,PsCГCрPIP°PSPSCЦ PïCГPµPïP°CГP°C,Cр Cр PrPsP·P°C... 500, 1000 C- 2000 PjPi PIC-PrPïPsPIC-PrPSPs. PµPsCГC-PIPSCЦPSPSCЦ PïPsPeP°P·P°P»Ps, C%oPs C,,P°CГPjP°PePsPeC-PSPµC,PëC±PSC- PïP°CГP°PjPµC,CГPë PjC-P¶ PrPsP·P°PjPë PïCГPµPïP°CГP°C,Cр C- PïPµCГC-PsPrP°PjPë PSP°PïC-PIPIPëPIPµPrPµPSPSCЦ PïPsPrC-P±PSC- C,P°PePëPj Cр PrPsCГPsCГP»PëC... PrP»CЦ PICГC-C..., PeCГC-Pj PSP°PNëPjPsP»PsPrC€PëC... PïP°C†C-C"PSC,C-PI (< 6 PjC-CГCЦC†C-PI t<sub>1/2</sub> 1,6 PiPsPrPëPSPë). PÿPµCГPµPrPSC- P·PSP°C±PµPSPSCЦ PeP»C-CГPµPSCГCр PjPµCГPsPïPµPSPµPjCр CГC,P°PSPsPIPëP»Pë 5,8 PjP»/C...PI/PePi (6-12 CГPsPeC-PI), 6,2 PjP»/C...PI/PePi (2-5 CГPsPeC-PI), 5,3 PjP»/C...PI/PePi (6-23 PjC-CГCЦC†C-) C- 4,3 PjP»/C...PI/PePi (2-5 PjC-CГCЦC†C-PI). PµCГPëP±P»PëP·PSPs 60 % PrPsP·Pë PIPëPIPsPrPëC,СГCГCЦ C-P· CГPµC±PµC PïCГPsC,CЦPiPsPj 12 PiPsPrPëPS Cр PIPëPiP»CЦPrC- PjPµCГPsPïPµPSPµPjCр C,P° C%oPµ 12 % BГ" Cр PIPëPiP»CЦPrC- PjPµC,P°P±PsP»C-C,Cр. PлPsPSC†PµPSC,CГP°C†C-C— PjPµCГPsPïPµPSPµPjCр Cр CГPïPëPSPSPsPjPsP·PePsPIC-PNë CГC-PrPëPSC- Cр PrC-C,PµPNë P· PjPµPSC-PSPiC-C,PsPj CГC,P°PSPsPIP»CЦC,СГ PïCГPëP±P»PëP·PSPs 20 % PIC-Pr PsPrPSPsC±P°CГPSPs

PIPëCΠIP»PμPSPëC... CḡC-PIPSC-PI PìCḡPμPìP°CḡP°C,Cr Cr PìP»P°P·PjC- PeCḡPsPIC-, C...PsC±P° PjP°C" PjC-CÍC†Pμ P·PSP°C±PSP° PjC-P¶C-PSPrPëPIC-PrCrP°P»CḡPSP° PIP°CḡC-P°P±PμP»CḡPSC-CÍC,Cḡ PìPsPeP°P·PSPëPeC-PI.

PαP°CḡPjP°PePsPeC-PSPμC,PëPeP° PjPμCḡPsPìPμPSPμPjCr Cr PSPsPIPSPSP°CḡPsPrP¶PμPSPëC..., CΠPePëPj P·P°CÍC,PsCÍPsPICrPIP°P»Pë P°PSC,PëP±P°PeC,PμCḡC-P°P»CḡPSPμ P»C-PeC†PIP°PSPSCΠ, PìCḡPsPrPμPjPsPSCÍC,CḡCrPIP°P»P° PIPëC%PëPNë PeP»C-CḡPμPSCÍ Cr PSPsPIPSPSP°CḡPsPrP¶PμPSPëC... P· P±C-P»CḡCëPëPj C...CḡPsPSPsP»PsPiC-C±PSPëPj P°P±Ps PìPμCÍC,P°C†C-PNëPSPëPj PIC-PePsPj C-P· P·P°PìP°P»CḡPSPëPj CÍPμCḡPμPrPSC-Pj PìPμCḡC-PsPrPsPj PSP°PìC-PIPIPëPIPμPrPμPSPSCΠ 2,9 PìPsPrPëPSPë. PḡPsPrPμP»CḡPIP°PSPSCΠ PìCḡPsC†PμCÍCr P·P° PḡPsPSC,Pμ PḡP°CḡP»Ps PSP° PsCÍPSPsPIC- PìPsPìCrP»CΠC†C-PNëPSPsC— PαPḡ-PjPsPrPμP»C- PìPsPeP°P·P°P»Ps, C%Ps PìCḡPë CḡPμP¶PëPjC- PrPsP·CrPIP°PSPSCΠ 20 PjPi/PePi PePsP¶PSC- 8 PìPsPrPëPS P±CrP»Ps PrPsCÍCΠPìPSCrC,Ps T > MIC 60 % PìPs PIC-PrPSPsCëPμPSPSCḡ PrPs P. aeruginosa Cr 95 % PSPμPrPsPSPsCëPμPSPëC... PSPsPIPSPSP°CḡPsPrP¶PμPSPëC... C- Cr 91 % PrPsPSPsCëPμPSPëC... PSPsPIPSPSP°CḡPsPrP¶PμPSPëC....

PμP°C†C-C" PSC,Pë P»C-C,PSCHḡPsPìPs PIC-PeC†

PαP°CḡPjP°PePsPeC-PSPμC,PëC±PSC- PrPsCÍP»C-PrP¶PμPSPSCΠ Cr P·PrPsCḡPsPIPëC... PrPsP±CḡPsPIPSP»CḡC†C-PI P»C-C,PSCHḡPsPìPs PIC-PeC† (65-80 CḡPsPeC-PI) PìPsPeP°P·P°P»Pë P·PSPëP¶PμPSPSCΠ PìP»P°P·PjPsPIPSPìPs PeP»C-CḡPμPSCÍCr, C%Ps PePsCḡPμP»CḡPIP°P»Ps P·C- P·PSPëP¶PμPSPSCΠPj PeP»C-CḡPμPSCÍCr PeCḡPμP°C,PëPSC-PSCr, PìPsPìC¶P·P°PSPëPj P· PIC-PePsPj, P° C,P°PePsP¶P PSPμP·PSP°C±PSPμ P·PSPëP¶PμPSPSCΠ PSPμPSPëCḡPePsPIPSPìPs PeP»C-CḡPμPSCÍCr. PḡPsCḡPμPeC†C-CΠ PrPsP·Pë PìCḡPμPìP°CḡP°C,Cr PìP°C†C-C" PSC,P°Pj P»C-C,PSCHḡPsPìPs PIC-PeC† PSPμ PìPsC,CḡC-P±PSP°, P·P° PIPëPSCΠC,PePsPj PIPëPìP°PrPeC-PI PìPsPjC-CḡPSPsPìPs C- C,CΠP¶PePsPìPs PìPsCḡCrCëPμPSPSCΠ C,,CrPSPeC†C-C— PSPëCḡPsPe.

**PḡP»C-PSC-C±PSC- C...P°CḡP°PeC,PμCḡPëCÍC,PëPePë.**

**PμPsPeP°P·P°PSPSCΠ.**

P»C-PeC†PIP°PSPSCΠ C-PSC,,PμPeC†C-PNë Cr PrPsCḡPsCÍP»PëC... C- PrC-C,PμPNë PIC-PePsPj PIC-Pr 3 PjC-CÍCΠC†C-PI, C,P°PePëC... CΠPe:

- PìPSPμPIPjPsPSC-CΠ, Cr C,PsPjCr C±PëCÍP»C- PSPμPìPsCÍPìC-C,P°P»CḡPSP° C,P° PìPsCÍPìC-C,P°P»CḡPSP° PìPSPμPIPjPsPSC-C—;
- P±CḡPsPSC...PsP»PμPìPμPSPμPIC- C-PSC,,PμPeC†C-C— PìCḡPë PjCrPePsPIC-CÍC†PëPrPsP·C-;
- CrCÍPeP»P°PrPSPμPSC- C-PSC,,PμPeC†C-C— CÍPμC±PsPIPëPIC-PrPSPëC... CëP»CΠC...C-PI;
- CrCÍPeP»P°PrPSPμPSC- C-PSC,CḡP°P°P±PrPsPjC-PSP°P»CḡPSC- C-PSC,,PμPeC†C-C—;
- C-PSC,,PμPeC†C-C— PìC-Pr C±P°CÍ PìPsP»PsPiC-PI C- PìC-CÍP»CΠPìPsP»PsPìPsPIC- C-PSC,,PμPeC†C-C—;
- CrCÍPeP»P°PrPSPμPSC- C-PSC,,PμPeC†C-C— CëPeC-CḡPë C- Pjβḡ™ CΠPePëC... C,PeP°PSPëPS;
- PìPsCÍC,CḡPëPNë P±P°PeC,PμCḡC-P°P»CḡPSPëPNë PjPμPSC-PSPiC-C,.



PiC7PsP±PμPSPμC†PēPrCí P· PjPμC7PsPiPμPSPμPjPsPj.

PμC7Pē PsPrPSPsC†P°CÍPSPsPjCí P·P°CÍC,PsCÍCíP°PSPSC- P·PeP°C7P±P°PiPμPSPμPjP°PjPē P±CíP»Ps P·P°C7PμC”CÍC,C7PsPIP°PSPs P·PSPēP¶PμPSPSC¶ C7C-PIPSC¶ PIP°P»CHPíC7PsC”PIPsC— PePēCÍP»PsC,Pē PI PeC7PsPIC- PSP° 60-100 % PIPíC7PsPrPsPIP¶ PiC7PēP±P»PēP·PSPs PrPIPsC... PrPSC-PI. P§PμC7PμP· CēPIPēPrPePēP№ PiPsC†P°C,PsPe PrC-C— C,P° CÍC,CíPíC-PSC¶ P·PSPēP¶PμPSPSC¶ PsPrPSPsC†P°CÍPSPμ P·P°CÍC,PsCÍCíP°PSPSC¶ PIP°P»CHPíC7PsC”PIPsC— PePēCÍP»PsC,Pē/PIP°P»CHPíC7PsP°C,Cž PSP°C,C7C-C¶/PIP°P»CHPíC7PsPjC-PrCž C- PeP°C7P±P°PiPμPSPμPjC-PI PSPμ PIP°P¶P°C”C,CHCÍC¶ PePμC7PsPIP°PSPēPj, C,PsPjCí CÍP»C-Pr CíPSPēPeP°C,Pē C,P°PePsC— PIP·P°C”PjPsPrC-C— (PrPēPI. C7PsP·PrC-P» B«PhCÍPsP±P»PēPIPsCÍC,C- P·P°CÍC,PsCÍCíP°PSPSC¶B»).

PhPrPSPsC†P°CÍPSPμ P·P°CÍC,PsCÍCíP°PSPSC¶ P°PSC,PēP±C-PsC,PēPeC-PI P· PiPμC7PsC7P°P»CHPSPēPjPē P°PSC,PēPePsP°PiCžP»C¶PSC,P°PjPē, PI C.,C†. PIP°C7C„P°C7PēPSPsPj, PjPsP¶Pμ P·P±C-P»CHCēPēC,Pē P°PSC,PēPePsP°PiCíP»C¶PSC,PSPēP№ PμC„PμPeC, PIP°C7C„P°C7PēPSCí. P’CíP»Ps P·P°C7PμC”CÍC,C7PsPIP°PSPs P±P°PiP°C,Ps PiPsPIC-PrPsPjP»PμPSC¶ PiC7Ps PiPsCÍPēP»PμPSPSC¶ P°PSC,PēPePsP°PiCíP»C¶PSC,PSPēC... PμC„PμPeC,C-PI PiPμC7PsC7P°P»CHPSPēC... P°PSC,PēPePsP°PiCíP»C¶PSC,C-PI, Cí C.,C†. PIP°C7C„P°C7PēPSCí, Cí PiP°C†C-C”PSC,C-PI, C¶PeC- PsPrPSPsC†P°CÍPSPs PsC,C7PēPjCíC7C,CH P°PSC,PēP±P°PeC,PμC7C-P°P»CHPSC- PiC7PμPiP°C7P°C,Pē. P PēP·PēPe PjPsP¶Pμ P·PjC-PSC¶PIP°C,PēCÍC¶ P·P°P»PμP¶PSPs PIC-Pr PsCÍPSPsPIPSPsC— C-PSC„PμPeC†C-C—, PIC-PeCí C- P·P°PiP°P»CHPSPsPiPs CÍC,P°PSCí PiP°C†C-C”PSC,P°, C,PsPjCí PIPSPμCÍPsPe P°PSC,PēP±P°PeC,PμC7C-P°P»CHPSPēC... PiC7PμPiP°C7P°C,C-PI Cí PiC-PrPIPēC%PμPSPSC¶ P¶PíP’ (PjC-P¶PSP°C7PsPrPSPsPiPs PSPsC7PjP°P»C-P·PsPIP°PSPsPiPs PIC-PrPSPsCēPμPSPSC¶) PsC†C-PSPēC,Pē PIP°P¶PePs. P PμPePsPjPμPSPrCíC”C,CHCÍC¶ PiC7PsPIPsPrPēC,Pē C†P°CÍC,PēP№ PePsPSC,C7PsP»CH P¶PíP’ PiC-Pr C†P°CÍ C,P° PSPμP·P°P±P°C7PsPj PiC-CÍP»C¶ PsPrPSPsC†P°CÍPSPsPiPs P·P°CÍC,PsCÍCíP°PSPSC¶ P°PSC,PēP±C-PsC,PēPeC-PI P· PiPμC7PsC7P°P»CHPSPēPj P°PSC,PēPePsP°PiCíP»C¶PSC,PsPj.

**PhCÍPsP±P»PēPIPsCÍC,C- P·P°CÍC,PsCÍCíP°PSPSC¶.**

PμC7Pē PIPēP±PsC7C- PjPμC7PsPiPμPSPμPjCí PrP»C¶ P»C-PeCíPIP°PSPSC¶ CÍP»C-Pr P±C7P°C,Pē PrPs CíPIP°PiPē PrPsC†C-P»CHPSC-CÍC,CH P·P°CÍC,PsCÍCíP°PSPSC¶ P°PSC,PēP±P°PeC,PμC7C-P°P»CHPSPsPiPs P·P°CÍPsP±Cí PiC7CíPiPē PeP°C7P±P°PiPμPSPμPjC-PI, PIC7P°C...PsPICíC7C†Pē C,P°PeC- C„P°PeC,PsC7Pē, C¶Pe C,C¶P¶PeC-CÍC,CH C-PSC„PμPeC†C-C—, PiPsCēPēC7PμPSC-CÍC,CH C7PμP·PēCÍC,PμPSC,PSPsCÍC,C- PrPs C-PSCēPēC... PIC-PrPiPsPIC-PrPSPēC... P°PSC,PēP±P°PeC,PμC7C-P°P»CHPSPēC... P·P°CÍPsP±C-PI, P° C,P°PePsP¶ C7PēP·PēPe PIPēP±PsC7Cí PiC7PμPiP°C7P°C,Cí C%PsPrPs P±P°PeC,PμC7C-P№, CÍC,C-P№PePēC... PrPs PeP°C7P±P°PiPμPSPμPjC-PI.

P PμP·PēCÍC,PμPSC,PSC-CÍC,CH PrPs Enterobacteriaceae, Pseudomonas aeruginosa C,P° Acinetobacter

P PμP·PēCÍC,PμPSC,PSC-CÍC,CH Enterobacteriaceae, Pseudomonas aeruginosa C- Acinetobacter PrPs PiPμPSPμPjC-PI PIP°C7C-C7C”C,CHCÍC¶ PI PjPμP¶P°C... P„PIC7PsPiPμP№CÍCHPePsPiPs PŸPsC7P·Cí. PμC7Pē PiC7PēP·PSP°C†PμPSPSC-



P°PSC, PëP±C-PsC, PëPePsP°CÍPsC†C-PM°PsPIP°PSPsPiPs PePsP»C-C, Cr, PI C, .C‡.  
PiCÍPµPIPrPsPjPµPjP±CĤP°PSPsP·PSPsPiPs PePsP»C-C, Cr, CÍC, CrPiC-PSCĤ C, CĤP¶PePsCÍC, C-  
CĤPePsPiPs PjPsP¶Pµ PIP°CĤC-CĤPIP°C, Pë PIC-Pr P»PµPiPePsPiPs PrPs C, P°PePsPiPs, C%°Ps  
CÍC, P°PSPsPIPëC, CĤ P·P°PiCĤPsP·Cr P¶PëC, C, CĤ. PÿPsPjCr PIP°P¶P»PëPIPs  
CĤPsP·PiP»CĤPrP°C, Pë PjPsP¶P»PëPIC-CÍC, CĤ C, P°PePsPiPs PrC-P°PiPSPsP·Cr Cr  
PiP°C†C-C°PSC, C-PI, Cr CĤPePëC... PiC-Pr C‡P°CÍ P°P±Ps PiC-CÍP»CĤ  
P·P°CÍC, PsCÍCrPIP°PSPSCĤ PjPµCĤPsPiPµPSPµPjCr PIPëPSPëPeP»P° PrC-P°CĤPµCĤ (PrPëPI.  
CĤPsP·PrC-P» B«PµPsP±C-C‡PSC- CĤPµP°PeC†C-C—B»). PÿP»C-Pr CĤPsP·PiP»CĤPSCrC, Pë  
PiPëC, P°PSPSCĤ PiCĤPs PiCĤPëPiPëPSPµPSPSCĤ C, PµCĤP°PiC-C— PjPµCĤPsPiPµPSPµPjPsPj  
C, P° P·P°CÍC, PsCÍCrPIP°PSPSCĤ CÍPiPµC†PëC, „C-C‡PSPsPiPs P»C-PeCÍPIP°PSPSCĤ,  
PSP°PiCĤP°PIP»PµPSPsPiPs PiCĤPsC, Pë *Clostridium difficile*. PkPµ CÍP»C-Pr  
PiCĤPëP·PSP°C‡P°C, Pë P»C-PeP°CĤCÍCĤPeC- P·P°CÍPsP±Pë, CĤPeC-  
PiCĤPëPiPSC-C‡CrCĤC, CĤ PiPµCĤPëCÍC, P°P»CĤC, PëPeCr PePëC€PµC‡PSPëPeCr.

PÿCáPrPsPjPë

PµC-Pr C‡P°CÍ P»C-PeCÍPIP°PSPSCĤ PeP°CĤP±P°PiPµPSPµPjP°PjPë, Cr C, PsPjCr C‡PëCÍP»C-  
PjPµCĤPsPiPµPSPµPjPsPj, CĤC-PrPePs PiPsPIC-PrPsPjP»CĤP»PsCÍCĤ PiCĤPs PSP°PiP°PrPë  
CÍCrPrPsPj (PrPëPI. CĤPsP·PrC-P» B«PµPsP±C-C‡PSC- CĤPµP°PeC†C-C—B»).

PµPµPrPëPeP°PjPµPSC, PsP·PSPµ CáCĤP°P¶PµPSPSCĤ PiPµC‡C-PSPePë

PµC-Pr C‡P°CÍ P»C-PeCÍPIP°PSPSCĤ PjPµCĤPsPiPµPSPµPjPsPj CÍP»C-Pr CĤPµC, PµP»CĤPSPs  
PePsPSC, CĤPsP»CĤPIP°C, Pë C, „CÍPSPeC†C-CĤ PiPµC‡C-PSPePë C‡PµCĤPµP· CĤPëP·PëPe  
PjPµPrPëPeP°PjPµPSC, PsP·PSPs-C-PSPrCrPePsPIP°PSPsPiPs CrCĤP°P¶PµPSPSCĤ  
PiPµC‡C-PSPePë (DILI) (PrPëPI. CĤPsP·PrC-P» B«PµPsP±C-C‡PSC- CĤPµP°PeC†C-C—B»).

PJ CĤP°P·C- PIPëPSPëPePSPµPSPSCĤ C, CĤP¶PePsPiPs DILI CÍP»C-Pr CĤPsP·PiP»CĤPSCrC, Pë  
PiCĤPëPiPëPSPµPSPSCĤ P»C-PeCÍPIP°PSPSCĤ CĤPe PeP»C-PSC-C‡PSPs PrPsC†C-P»CĤPSPµ.  
PµPsPIC, PsCĤPSPµ P·P°CÍC, PsCÍCrPIP°PSPSCĤ PjPµCĤPsPiPµPSPµPjCr PjPsP¶P»PëPIPµ  
P»PëC€Pµ P·P° CrPjPsPIPë PSPµPsP±C...C-PrPSPsCÍC, C- P»C-PeCÍPIP°PSPSCĤ C†PëPj  
P»C-PeP°CĤCÍCĤPePëPj P·P°CÍPsP±PsPj.

P—P°CÍC, PsCÍCrPIP°PSPSCĤ PiCĤPµPiP°CĤP°C, Cr PiP°C†C-C°PSC, P°Pj C-P·  
P·P°C...PIPsCĤCĤPIP°PSPSCĤPjPë PiPµC‡C-PSPePë: PiC-Pr C‡P°CÍ  
P»C-PeCÍPIP°PSPSCĤ PjPµCĤPsPiPµPSPµPjPsPj Cr PiP°C†C-C°PSC, C-PI C-P·  
PSP°CĤPIPSPëPjPë P·P°C...PIPsCĤCĤPIP°PSPSCĤPjPë PiPµC‡C-PSPePë CÍP»C-Pr  
PePsPSC, CĤPsP»CĤPIP°C, Pë C, „CÍPSPeC†C-CĤ PiPµC‡C-PSPePë.  
PµPsCĤPëPiCÍPIP°PSPSCĤ PrPsP·Pë PiCĤPµPiP°CĤP°C, Cr PSPµ PiPsC, CĤC-P±PSPµ (PrPëPI.  
CĤPsP·PrC-P» B«PÿPiPsCÍC-P± P·P°CÍC, PsCÍCrPIP°PSPSCĤ C, P° PrPsP·PëB»).

PÿPµCĤPsPePsPSPIPµCĤCÍC-CĤ PiCĤCĤPjPsPiPs  
P°PSC, PëPiP»PsP±CáP»C-PSPsPIPsPiPs C, PµCÍC, Cá (C, PµCÍC, PµCáPjP±CÍP°)

P>C-PeCÍPIP°PSPSCĤ PjPµCĤPsPiPµPSPµPjPsPj PjPsP¶Pµ PiCĤPëP·PIPµCÍC, Pë PrPs  
PIPëPSPëPePSPµPSPSCĤ PiPsP·PëC, PëPIPSPsPiPs PiCĤCĤPjPsPiPs/PSPµPiCĤCĤPjPsPiPs  
C, PµCÍC, Cr PµCÍPjP±CÍP°.

PµPrPSPsC‡P°CÍPSPµ P·P°CÍC, PsCÍCrPIP°PSPSCĤ PjPµCĤPsPiPµPSPµPjCr C-  
PIP°P»CĤPiCĤPsC°PIPsC— PePëCÍP»PsC, Pë/PIP°P»CĤPiCĤPsP°C, Cr

PSP°C, CĤC-CĤ/PIP°P»CĤPĪCĤPsPjC-PrCř PSPµ CĤPµPePsPjPµPSPřCřC”C, CĤCĪCĪ (PrPëPI. CĤPsP·PrC-P» B«P·P·P°C”PjPsPrC-CĪ P· C-PSC€PëPjPë P»C-PeP°CĤCĪCĤPePëPjPë P·P°CĪPsP±P°PjPë C, P° C-PSC€C- PIPëPrPë PIP·P°C”PjPsPrC-PMëB»).

PĤPµCĤPsP±PsC†PëPr PjC-CĪC, PëC, CĤ PĪCĤPëP±P»PëP·PSPs 2,0 PjPµPePI P°P±Ps 4,0 PjPµPePI PSP°C, CĤC-CĤ PSP° 500 PjPi P°P±Ps 1000 PjPi PrPsP·Pë PĪCĤPµPĪP°CĤP°C, Cř PIC-PrPĪPsPIC-PrPSPs, C%Ps PSPµPsP±C...C-PrPSPs PICĤP°C...PsPICřPIP°C, Pë PĪCĤPë PĪCĤPëP·PSP°C†PµPSPSC- PĪCĤPµPĪP°CĤP°C, Cř PĪP°C†C-C”PSC, P°Pj, CĪPeC- PĪPµCĤPµP±CřPIP°CĤC, CĤ PSP° PrC-C”C, C- P· PePsPSC, CĤPsP»CĤPsPIP°PSPëPj PIPjC-CĪC, PsPj PSP°C, CĤC-CĤ.

*P—P°CĪC, PsCĪCžPIP°PSPSCĪ Cž PĪPµCĤC-PsPr PIP°PiC-C, PSPsCĪC, C- P°P±Ps PĪPsPrCžPIP°PSPSCĪ PĪCĤCžPrPrCĤ.*

P”P°PSC- C%PsPrPs P·P°CĪC, PsCĪCřPIP°PSPSCĪ PjPµCĤPsPĪPµPSPµPjCř PIP°PiC-C, PSPëPjPë P¶C-PSPeP°PjPë PIC-PrCĪCřC, PSC- P°P±Ps C—C... PeC-P»CĤPeC-CĪC, CĤ PsP±PjPµP¶PµPSP°. P”PsCĪP»C-PrP¶PµPSPSCĪ PSP° C, PIP°CĤPëPSP°C... PSPµ PIPëCĪPIPëP»Pë PĪCĤCĪPjPëC... P°P±Ps PsPĪPsCĪPµCĤPµPrPePsPIP°PSPëC... PµC, PµPeC, C-PI CĤPµPĪCĤPsPrCřPeC, PëPIPSPSC— C, PsPeCĪPëC†PSPsCĪC, C-.

PĪPe P·P°PĪPsP±C-P¶PSPëPMë P·P°C...C-Pr P±P°P¶P°PSPs CřPSPëPeP°C, Pë P·P°CĪC, PsCĪCřPIP°PSPSCĪ PjPµCĤPsPĪPµPSPµPjCř PĪC-Pr C†P°CĪ PIP°PiC-C, PSPsCĪC, C-.

PĪPµPIPµP»PëPeP° PeC-P»CĤPeC-CĪC, CĤ PjPµCĤPsPĪPµPSPµPjCř PĪCĤPsPSPëPeP°C” Cř PĪCĤCřPrPSPµ PjPsP»PsPePs P»CĤPrPëPSPë. PĤPµCĤPsPĪPµPSPµPj PjPsP¶PSP° P·P°CĪC, PsCĪPsPICřPIP°C, Pë P¶C-PSPeP°Pj, CĪPeC- PĪPsPrCřCĤC, CĤ PĪCĤCřPrPrCĤ, P»PëC€Pµ Cř PIPëPĪP°PrPeP°C..., CĪPeC%Ps PsC†C-PeCřPIP°PSP° PePsCĤPëCĪC, CĤ PrP»CĪ PjP°C, PµCĤC- PĪPµCĤPµPIPëC%CřC” PĪPsC, PµPSC†C-PMëPSPëPMë CĤPëP·PëPe PrP»CĪ PrPëC, PëPSPë.

*P—PrP°C, PSC-CĪC, CĤ PIPĪP»PëPIP°C, Pë PSP° C€PIPëPrPeC-CĪC, CĤ CĤPµP°PeC†C-C— PĪCĤPë PePµCĤCžPIP°PSPSC- P°PIC, PsC, CĤP°PSCĪPĪPsCĤC, PsPj P°P±Ps C-PSC€PëPjPë PjPµC...P°PSC-P·PjP°PjPë.*

P”PsCĪP»C-PrP¶PµPSPSCĪ PIPĪP»PëPICř PjPµCĤPsPĪPµPSPµPjCř PSP° P·PrP°C, PSC-CĪC, CĤ PePµCĤCřPIP°C, Pë C, CĤP°PSCĪPĪPsCĤC, PSPëPjPë P·P°CĪPsP±P°PjPë C, P° C-PSC€PëPjPë PjPµC...P°PSC-P·PjP°PjPë PSPµ PĪCĤPsPIPPrPëP»PëCĪCĪ.

PĤPrPSP°Pe PĪCĤPë PePµCĤCřPIP°PSPSC- P°PIC, PsC, CĤP°PSCĪPĪPsCĤC, PsPj P°P±Ps C-PSC€PëPjPë PjPµC...P°PSC-P·PjP°PjPë CĤPµPePsPjPµPSPřCřC”C, CĤCĪCĪ PrPsC, CĤPëPjCřPIP°C, PëCĪCĪ PsCĪPsP±P»PëPIPsC— PsP±PµCĤPµP¶PSPsCĪC, C-, PICĤP°C...PsPICřCĤC†Pë PjPsP¶P»PëPIC-CĪC, CĤ CĤPsP·PIPëC, PeCř PĪPsP»PsPIPSPsPĪPs P±PsP»CĤ, PĪP°CĤPµCĪC, PµP·C-PMë P°P±Ps CĪCřPrPsPj, PĪCĤPs CĪPeC- PĪPsPIC-PrPsPjP»CĪP»PsCĪCĤ PĪCĤPë P·P°CĪC, PsCĪCřPIP°PSPSC- PjPµCĤPsPĪPµPSPµPjCř.

***PŸPĪPsCĪC-P± P·P°CĪC, PsCĪCžPIP°PSPSCĪ C, P° PrPsP·Pë.***



P°PsCíC, CĤPëPNë P±P°PeC, PµCĤC-P°P»CHPSPëPNë PjPµPSC-PSPiC-C,	2 Pi
P>C-PeCíPIP°PSPSCĬ PïP°C†C-C°PSC, C-PI P· C,, PµP±CĤPëP»CHPSPsCĤ PSPµPNëC, CĤPsPïPµPSC-C°CĤ	1 Pi

PĤPµCĤPsP±PsC†PëPr P·P°P·PIPëC†P°PNë CíP»C-Pr P·P°CíC, PsCíPsPICíPIP°C, Pë Cí  
PIPëPiP»CĬPrC- PIPSCíC, CĤC-CëPSCĤPsPIPµPSPSPsC— C-PSC,, CíP·C-C—  
C, CĤPëPIP°P»C-CíC, CĤ PIC-Pr 15 PrPs 30 C...PIPëP»PëPS.

PĤCĤC-Pj C, PsPiPs, PrPsP·Pë PïCĤPµPïP°CĤP°C, Cí PrPs 1 Pi PjPsP¶PSP° PIPiPsPrPëC, Pë Cí  
PIPëPiP»CĬPrC- PIPSCíC, CĤC-CëPSCĤPsPIPµPSPSPsC— P±PsP»CĤCíPSPsC—  
C-PSBĤ™ C°PeC†C-C— PïCĤPsC, CĬPiPsPj PïCĤPëP±P»PëP·PSPs 5 C...PIPëP»PëPS. P°P°PSC- P·  
P±PµP·PïPµPePë C°PsPrPs PIPiPµPrPµPSPSCĬ PrPsCĤPsCíP»PëPj PïCĤPµPïP°CĤP°C, Cí Cí  
PrPsP·C- 2 Pi Cí PIPëPiP»CĬPrC- PIPSCíC, CĤC-CëPSCĤPsPIPµPSPSPsC— P±PsP»CĤCíPSPsC—  
C-PSBĤ™ C°PeC†C-C— PsP±PjPµP¶PµPSC-.

*PµPsCĤCáCëPµPSPSCĬ C,, CáPSPeC†C-C— PSPëCĤPsPe*

PÿP°P±P»PëC†CĬ 3

P PµPePsPjPµPSPPrPsPIP°PSC- PrPsP·Pë PïCĤPµPïP°CĤP°C, Cí PrP»CĬ PrPsCĤPsCíP»PëC... C, P°  
PrC-C, PµPNë P· PjP°CíPsCĤ C, C-P»P° PïPsPSP°Pr 50 PePi PïCĤPë PeP»C-CĤPµPSCíC-  
PeCĤPµP°C, PëPSC-PSCí PjPµPSCëPµ 51 PjP»/C...PI

PĤP»C-CĤPµPSCí PeCĤPµP°C, PëPSC-PSCí (PjP»/C...PI)	P P°P·PsPIP° PrPsP·P° (PrPëPI. C, P°P±P»PëC†CĤ 1)	PŞP°CíC, PsC, P°
26-50	PïPsPIPSP° CĤP°P·PsPIP° PrPsP·P°	PePsP¶PSC- 12 PiPsPrPëPS
10-25	PïPsP»PsPIPëPSP° CĤP°P·PsPIPsC— PrPsP·Pë	PePsP¶PSC- 12 PiPsPrPëPS
<10	PïPsP»PsPIPëPSP° CĤP°P·PsPIPsC— PrPsP·Pë	PePsP¶PSC- 24 PiPsPrPëPSPë

P†CíPSCíC° PsP±PjPµP¶PµPSP° PeC-P»CHPeC-CíC, CH PrP°PSPëC... C°PsPrPs  
P·P°CíC, PsCíCíPIP°PSPSCĬ C†PëC... PePsCĤPëPïCíPIP°PSCĤ PrP»CĬ CĤP°P·PsPIPsC—  
PrPsP·Pë 2 Pi.

PĤPµCĤPsPïPµPSPµPj PIPëPiPsPrPëC, CĤCíCĬ CëP»CĬC...PsPj PiPµPjPsPrC-P°P»C-P·Cí C, P°  
PiPµPjPsC,, C-P»CHC, CĤP°C†C-C—, C, PsPjCí PSPµPsP±C...C-PrPSCí PrPsP·Cí  
PïCĤPµPïP°CĤP°C, Cí CíP»C-Pr PIPiPsPrPëC, Pë PïC-CíP»CĬ P·P°PIPµCĤCëPµPSPSCĬ  
PïCĤPsC†PµPrCíCĤPë PiPµPjPsPrC-P°P»C-P·Cí.

P PµPePsPjPµPSPPrP°C†C-PNë C°PsPrPs PrPsP·CíPIP°PSPSCĬ PïCĤPµPïP°CĤP°C, Cí  
PïP°C†C-C°PSC, P°Pj, CĬPeC- PïPµCĤPµP±CíPIP°CĤC, CH PSP°  
PïPµCĤPëC, PsPSPµP°P»CHPSPsPjCí PrC-P°P»C-P·C-, PSPµPjP°C°.

*PµPsCĤCáCëPµPSPSCĬ C,, CáPSPeC†C-C— PïPµC†C-PSPePë*

PμP°C†C-C" PSC, P° Pj P· PīPsCḤCfCεPμPSPSClPj C,, CfPSPeC†C-C— PīPμC†C-PSPePē  
 PePsCḤPēPiCfPIP°PSPSCl PrPsP·Pē PīCḤPμPīP°CḤP° C, Cf PSPμ PīPsC, CḤC-P±PSPμ.

*PμP°C†C-C" PSC, Pē P»C-C, PSCHbPsPiPs PIC-PeCz*

PμP°C†C-C" PSC, P° Pj P»C-C, PSCHbPsPiPs PIC-PeCf P· PSPsCḤPjP°P»CHbPSPsCḤ  
 C,, CfPSPeC†C-C" CḤ PSPēCḤPsPe P°P±Ps P·C- P·PSP°C†PμPSPSClPjPē PeP»C-CḤPμPSClCf  
 PeCḤPμP° C, PēPSC-PSCf PIPēC%oPμ 50 PjP»/C...PI PePsCḤPēPiCfPIP°PSPSCl PrPsP·Pē PSPμ  
 PīPsC, CḤC-P±PSPμ.

*P" C-C, Pē PIC-PePsPj PrPs 3 PjC-ClC†C-C-PI*

P·PμP·PīPμPeP° C, P° PμC,, PμPeC, PēPIPSC-ClC, CH P·P°ClC, PsClCfPIP°PSPSCl  
 PjPμCḤPsPīPμPSPμPjCf PrC-C, ClPj PIC-PePsPj PrPs 3 PjC-ClC†C-C-PI PSPμ  
 PIClC, P°PSPsPIP»PμPSC-, P° PsPīC, PēPjP°P»CHbPSP° ClC...PμPjP° PrPsP·CfPIP°PSPSCl  
 PSPμ PIPēP·PSP°C†PμPSP°.

PŷP°P±P»PēC†C† 4

P PμPePsPjPμPSPPrPsPIP°PSC- PrPsP·Pē PīCḤPμPīP°CḤP° C, Cf PrC-C, ClPj PIC-PePsPj PIC-Pr 3  
 PjC-ClC†C-C-PI PrPs 11 CḤPsPeC-PI P· PjP°ClPsCḤ C, C-P»P° PrPs 50 PePi

P†PSC,, PμPeC†C-C†	P P°P·PsPIP° PrPsP·P° PrP»C† PIPiPμPrPμPSPSCl PePsP¶PSC- 8 PiPsPrPēPS
PμPSPμPIPjPsPSC-C†, Cf C, PsPjCf C†PēClP»C- PSPμPiPsClPīC-C, P°P»CHbPSP° C, P° PīPsClPīC-C, P°P»CHbPSP°	10 P°P±Ps 20 PjPi/PePi PjP°ClPē C, C-P»P°
P·CḤPsPSC...PsP»PμPīPμPSPμPIC- C-PSC,, PμPeC†C-C— PīCḤPē PjCfPePsPIC-ClC†PēPrPsP·C-	40 PjPi/PePi PjP°ClPē C, C-P»P°
PjClPeP»P°PrPSPμPSC- C-PSC,, PμPeC†C-C— ClPμC†PsPIPēPIC-PrPSPēC... CεP»ClC...C-PI	10 P°P±Ps 20 PjPi/PePi PjP°ClPē C, C-P»P°
PjClPeP»P°PrPSPμPSC- C-PSC, CḤP°P°P±PrPsPjC-PSP°P»CHbPSC- C-PSC,, PμPeC†C-C—	10 P°P±Ps 20 PjPi/PePi PjP°ClPē C, C-P»P°
PjClPeP»P°PrPSPμPSC- C-PSC,, PμPeC†C-C— CεPeC-CḤPē C- PjβḤ™ ClPePēC... C, PeP°PSPēPS	10 P°P±Ps 20 PjPi/PePi PjP°ClPē C, C-P»P°
P"PsClC, CḤPēPNē P±P°PeC, PμCḤC-P°P»CHbPSPēPNē PjPμPSC-PSPiC-C,	40 PjPi/PePi PjP°ClPē C, C-P»P°
P·C-PeCfPIP°PSPSCl PīP°C†C-C" PSC, C-PI P· C,, PμP±CḤPēP»CHbPSPsCḤ PSPμPNēC, CḤPsPīPμPSC-C" CḤ	20 PjPi/PePi PjP°ClPē C, C-P»P°

PḤPμCḤPsP±PsC†PēPr P·P°P·PIPēC†P°PNē ClP»C-Pr P·P°ClC, PsClPsPICfPIP°C, Pē Cf  
 PIPēPiP»ClPrC- PIPSCfC, CḤC-CεPSCḤPsPIPμPSPSPsC— C-PSC,, C†P·C-C—  
 C, CḤPēPIP°P»C-ClC, CḤ PIC-Pr 15 PrPs 30 C...PIPēP»PēPS. PḤCḤC-Pj C, PsPiPs, PrPsP·Pē  
 PjPμCḤPsPīPμPSPμPjCf PrPs 20 PjPi/PePi PjPsP¶PSP° PIPiPsPrPēC, Pē Cf PIPēPiP»ClPrC-  
 PIPSCfC, CḤC-CεPSCḤPsPIPμPSPSPsC— P±PsP»CḤClPSPsC— C-PSβḤ™ C"PeC†C-C—

PiC7PsC,CiPiPsPj PiC7PëP±P»PëP·PSPs 5 C...PIPëP»PëPS. P°P°PSC- P· P±PµP·PiPµPePë  
C%oPsPrPs PIPµPrPµPSPSCi PrC-C,CiPj PiC7PµPiP°C7P°C,Cr Cr PrPsP·C- 40 PjPi/PePi Cr  
PIPëPiP»CiPrC- PIPSCrC,C7C-C€PSC7PsPIPµPSPSPsC— P±PsP»C7CíPSPsC—  
C-PS7™ C°PeC†C-C— PsP±PjPµP¶PµPSC-.

P°C-C,Pë P· PjP°CíPsc7 C,C-P»P° P±C-P»C7C€Pµ 50 PePi

PŸP»C-Pr P·P°CíC,PsCíPscPICrPIP°C,Pë PrPsP·Cr, CiPe PrP»Ci PrPsC7PsCíP»PëC...  
PiP°C†C-C°PSC,C-PI.

P°PscíPIC-PrCr P·P°CíC,PsCíCrPIP°PSPSCi PiC7PµPiP°C7P°C,Cr PrC-C,CiPj P·  
PiPsC7CfC€PµPSPSCiPj C,,CrPSPeC†C-C— PSPëC7PsPe PSPµPjP°C”.

PµC7PsPIPµPrPµPSPSCi PIPSCzC,C7C-C€PSC7PsPIPµPSPSPsC— P±PsP»C7CíPSPsC—  
C-PS7™ C°PeC†C-C—

P PsP·C±PëPS PrP»Ci P±PsP»C7CíPSPsC— C-PS7™ C°PeC†C-C— CíP»C-Pr PiPsC,CrPIP°C,Pë  
C€P»CiC...PsPj C7PsP·C±PëPSPµPSPSCi PiC7PµPiP°C7P°C,Cr P7PµC7PsP±PsC†PëPr Cr  
PIPPrC- PrP»Ci C-PS7™ C°PeC†C-PNë PrPs PsC,C7PëPjP°PSPSCi  
PePsPSC†PµPSC,C7P°C†C-C— 50 PjPi/PjP».

PíC-PjC-C±PSP° C- C,,C-P·PëC±PSP° CíC,P°P±C-P»C7PSC-CíC,C7  
PiC7PëPiPsC,PsPIP°PSPsPiPs C7PsP·C±PëPSCr PrP»Ci P±PsP»C7CíPSPsC—  
C-PS7™ C°PeC†C-C— P·P±PµC7C-PiP°C”C,C7CíCi PIPiC7PsPrPsPIP¶ 3 PiPsPrPëPS PiC7Pë  
C,PµPjPiPµC7P°C,CrC7C- PIC-Pr 15 PrPs 25 °PŸ.

P— PjC-PeC7PsP±C-PsP»PsPiC-C±PSPsC— C,PsC±PePë P·PsC7Cí PiC7PµPiP°C7P°C,  
PSPµPsP±C...C-PrPSPs P·P°CíC,PsCíPscPICrPIP°C,Pë PIC-PrC7P°P·Cr PiC-CíP»Ci  
PiC7PëPiPsC,CrPIP°PSPSCi.

PiPeC%oPs P»C-PeP°C7CíC7PePëPNë P·P°CíC-P± PsPrC7P°P·Cr P¶ PSPµ  
PIPëPePsC7PëCíC,P°PSPs, CíP»C-Pr C7PµC,PµP»C7PSPs PePsPSC,C7PsP»C7PIP°C,Pë  
C,PµC7PjC-PS C,P° CrPjPsPIPë P·P±PµC7C-PiP°PSPSCi PiC7PëPiPsC,PsPIP°PSPsPiPs  
C7PsP·C±PëPSCr.

PµC7PsPIPµPrPµPSPSCi PIPSCzC,C7C-C€PSC7PsPIPµPSPSPsC— C-PSC,,CzP·C-C—

P PsP·C±PëPS PrP»Ci C-PSC,,CrP·C-C— CíP»C-Pr PiPsC,CrPIP°C,Pë C€P»CiC...PsPj  
C7PsP·C±PëPSPµPSPSCi PiC7PµPiP°C7P°C,Cr P7PµC7PsP±PsC†PëPr Cr 0,9 % C7PsP·C±PëPSC-  
PSP°C,C7C-C7 C...P»PsC7PëPrCr PrP»Ci C-PSC,,CrP·C-PNë P°P±Ps Cr 5 % C7PsP·C±PëPSC-  
PiP»C7PePsP·Pë (PrPµPeCíC,C7PsP·Pë) PrP»Ci C-PSC,,CrP·C-PNë PrPs PsC,C7PëPjP°PSPSCi  
PePsPSC†PµPSC,C7P°C†C-C— 1-20 PjPi/PjP».

PíC-PjC-C±PSP° C- C,,C-P·PëC±PSP° CíC,P°P±C-P»C7PSC-CíC,C7  
PiC7PëPiPsC,PsPIP°PSPsPiPs C7PsP·C±PëPSCr PrP»Ci C-PSC,,CrP·C-C— P·  
PIPëPePsC7PëCíC,P°PSPSCiPj 0,9 % C7PsP·C±PëPSCr PSP°C,C7C-C7 C...P»PsC7PëPrCr  
P·P±PµC7C-PiP°C”C,C7CíCi PiC7PsC,CiPiPsPj 3 PiPsPrPëPS PiC7Pë C,PµPjPiPµC7P°C,CrC7C-  
PIC-Pr 15 PrPs 25 °PŸ P°P±Ps PIPiC7PsPrPsPIP¶ 24 PiPsPrPëPS PiC7Pë C,PµPjPiPµC7P°C,CrC7C-  
2-8 °PŸ. PµC7PëPiPsC,PsPIP°PSPëPNë C7PsP·C±PëPS, CiPeC%oPs PIC-PS P±CíPI  
PsC...PsP»PsPrP¶PµPSPëPNë, CíP»C-Pr P·P°CíC,PsCíPscPICrPIP°C,Pë PiC7PsC,CiPiPsPj 2

PiPsPrPëPS PiC-CÍP»CÍ P·P±PµCĤC-PiP°PSPSCÍ Cí C...PsP»PsPrPëP»CHĤPSPëPeCí.

P— PjC-PeCĤPsP±C-PsP»PsPiC-C±PSPsC— C,PsC±PePë P·PsCĤCí PiCĤPµPiP°CĤP°C, PSPµPsP±C...C-PrPSPs P·P°CÍC,PsCÍPsPICíPIP°C,Pë PIC-PrCĤP°P·Cí PiC-CÍP»CÍ PiCĤPëPiPsC,CíPIP°PSPSCÍ.

PİPeC%Ps P»C-PeP°CĤCÍCHĤPePëPNë P·P°CÍC-P± PsPrCĤP°P·Cí P¶ PSPµ PIPëPePsCĤPëCÍC,P°PSPs, CÍP»C-Pr CĤPµC,PµP»CHĤPSPs PePsPSC,CĤPsP»CĤPIP°C,Pë C,PµCĤPjC-PS C,P° CíPjPsPIPë P·P±PµCĤC-PiP°PSPSCÍ PiCĤPëPiPsC,PsPIP°PSPsPiPs CĤPsP·C±PëPSCí.

PµCĤPëPiPsC,PsPIP°PSPëPNë P· 5 % CĤPsP·C±PëPSPsPj PiP»CĤPePsP·Pë (PrPµPeCÍC,CĤPsP·Pë) CĤPsP·C±PëPS PĤPµCĤPsP±PsC±PëPrCí CÍP»C-Pr PIPëPePsCĤPëCÍC,P°C,Pë PSPµPiP°PNëPSPs.

PkPµ CÍP»C-Pr P·P°PjPsCĤPsP¶CíPIP°C,Pë PiCĤPëPiPsC,PsPIP°PSC- CĤPsP·C±PëPSPë.

P”C-C,Pë.

PµCĤPµPiP°CĤP°C, P·P°CÍC,PsCÍPsPICíCĤC,CHĤ PrC-C,CÍPj PIC-PePsPj PIC-Pr 3 PjC-CÍCÍC±C-PI.

**PµPµCĤPµPrPsP·C±PIP°PSPSCÍ.**

P’C-PrPSPsCÍPSPµ PiPµCĤPµPrPsP·CíPIP°PSPSCÍ PjPsP¶P»PëPIPµ Cí PiP°C±C-C”PSC,C-PI P· PiPsCĤCíCëPµPSPSCÍPj C,,CíPSPeC±C-C— PSPëCĤPsPe Cí PIPëPiP°PrPeCí, CÍPeC%Ps PrPsP·P° PiCĤPµPiP°CĤP°C,Cí PSPµ PePsCĤPëPiCíC”C,CHĤCÍCÍ, CÍPe PsPiPëCÍP°PSPs Cí CĤPsP·PrC-P»C- B«PÿPiPsCÍC-P± P·P°CÍC,PsCÍCíPIP°PSPSCÍ C,P° PrPsP·PëB».  
P”PsCÍPIC-Pr PiPsCÍC,PjP°CĤPePµC,PëPSPiPsPiPsPiPs P·P°CÍC,PsCÍCíPIP°PSPSCÍ PjPµCĤPsPiPµPSPµPjCí PsP±PjPµP¶PµPSPëPNë. PİPeC%Ps PiC-CÍP»CÍ PİPµCĤPµPrPsP·CíPIP°PSPSCÍ PIPëPSPëPeP°P»Pë PSPµP±P°P¶P°PSC- CĤPµP°PeC±C-C—, PIPsPSPë PIC-PrPiPsPIC-PrP°P»Pë PiCĤPsC,,C-P»CĤ PiPsP±C-C±PSPëC... CĤPµP°PeC±C-PNë PjPµCĤPsPiPµPSPµPjCí (PrPëPI. CĤPsP·PrC-P» B«PµPsP±C-C±PSC- CĤPµP°PeC±C-C—B»), P·P°P·PIPëC±P°PNë P±CíP»Pë P»PµPiPePsPiPs CÍC,CíPiPµPSCÍ C,CÍP¶PePsCÍC,C- C- PjPëPSP°P»Pë PiC-CÍP»CÍ PIC-PrPjC-PSPë PiCĤPµPiP°CĤP°C,Cí P°P±Ps P·PSPëP¶PµPSPSCÍ PNëPsPiPs PrPsP·Pë.

P>C-PeC±PIP°PSPSCÍ: CÍPëPjPiC,PsPjP°C,PëC±PSP° C,PµCĤP°PiC-CÍ. Pj PiP°C±C-C”PSC,C-PI P· PSPsCĤPjP°P»CHĤPSPsCĤ C,,CíPSPeC±C-C”CĤ PSPëCĤPsPe PIC-PrP±CíPIP°C”C,CHĤCÍCÍ CëPIPëPrPePµ PIPëPIPµPrPµPSPSCÍ PiCĤPµPiP°CĤP°C,Cí PSPëCĤPeP°PjPë. PĤPµCĤPsPiPµPSPµPj C,P° PNëPsPiPs PjPµC,P°P±PsP»C-C,Pë PIPëPIPsPrCÍC,CHĤCÍCÍ P· PsCĤPiP°PSC-P·PjCí CëP»CÍC...PsPj PiPµPjPsPrC-P°P»C-P·Cí.

**PµPsP±C-C±PSC- CĤPµP°PeC±C-C—.**

P’ C...PsPrC- PsPiP»CÍPrCí PrP°PSPëC... 4872 C-P· 5026 PiP°C±C-C”PSC,C-PI C%PsPrPs PIPiP»PëPICí P»C-PeCíPIP°PSPSCÍ PjPµCĤPsPiPµPSPµPjPsPj PSP°PNëC±P°CÍC,C-CëPëPjPë

PSPμP±P°P¶P°PSPëPjPë CḡPμP°PeC†C-CḡPjPë, PìPsPIBḡ™ CḡP·P°PSPëPjPë P· PNëPsPiPs P·P°C†C,PsC†C†PIP°PSPSCḡPj, P±C†P»Pë PrC-P°CḡPμCḡ (2,3 %), PIPëC†PëPì (1,4 %), PSC†PrPsC,P°/P±P»CḡPIP°PSPSCḡ (1,4 %) C,P° P·P°PìP°P»PμPSPSCḡ C† PjC-C†C†C- PIPμPrPμPSPSCḡ C-PSBḡ™ C”PeC†C-C— (1,1 %). Pk°PNëC†P°C†C,C-CëPëPjPë PSPμP±P°P¶P°PSPëPjPë, PìPsPIBḡ™ CḡP·P°PSPëPjPë C-P· P·P°C†C,PsC†C†PIP°PSPSCḡPj PjPμCḡPsPìPμPSPμPjC† CḡPIPëC%°P°PjPë P· P±PsPeC† P»P°P±PsCḡP°C,PsCḡPSPëC... PìPsPeP°P·PSPëPeC-PI, PìCḡPs CḡPeC- PìPsPIC-PrPsPjP»CḡP»PsC†Cḡ, P±C†P»Pë C,CḡPsPjP±PsC†PëC,PsP· (1,6 %) C,P° PìC-PrPIPëC%°PμPSPSCḡ CḡC-PIPSC-PI PìPμC†C-PSPePsPIPëC... C,,PμCḡPjPμPSC,C-PI (1,5-4,3 %).

Pk°PIPμPrPμPSC- PSPëP¶C†Pμ PIC†C- PìPsP±C-C†PSC- CḡPμP°PeC†C-C— P·P°P·PSP°C†PμPSC- P·P° PeP»P°C†PsPj C†PëC†C,PμPjPë PsCḡPiP°PSC-PI C- C†P°C†C,PsC,PsCḡ: PrC†P¶Pμ C†P°C†C,Ps (≥ 1/10); C†P°C†C,Ps (PIC-Pr ≥ 1/100 PrPs < 1/100); PSPμC†P°C†C,Ps (PIC-Pr ≥ 1/1000 PrPs < 1/100); CḡC-PrPePs (PIC-Pr ≥ 1/10000 PrPs < 1/1000); PrC†P¶Pμ CḡC-PrPePs (< 1/10000); C†P°C†C,PsC,P° PSPμPIC-PrPsPjP° (PSPμ PjPsP¶PSP° PsC†C-PSPëC,Pë PSP° PsC†PSPsPIC- PSP°CḡPIPSPëC... PrP°PSPëC...). Pj PjPμP¶P°C... PePsP¶PSPsC— PiCḡC†PìPë C†P°C†C,PsC, PìPsP±C-C†PSC- CḡPμP°PeC†C-C— P·P°P·PSP°C†PμPSC- C† PìPsCḡCḡPrPeC† P·PjPμPSCëPμPSPSCḡ PìCḡPsCḡPIC-PI.

*PḡCḡPsPI C- P»C-PjC,,P°C,PëC†PSP° C†PëC†C,PμPjP°: C†P°C†C,Ps Bḡ“ C,CḡPsPjP±PsC†PëC,PμPjC-Cḡ; PSPμC†P°C†C,Ps Bḡ“ P°PiCḡP°PSC†P»PsC†PëC,PsP·, PìPμPjPsP»C-C,PëC†PSP° P°PSPμPjC-Cḡ, C,CḡPsPjP±PsC†PëC,PsPìPμPSC-Cḡ, PSPμPNëC,CḡPsPìPμPSC-Cḡ, P»PμPNëPePsPìPμPSC-Cḡ, PμPsP·PëPSPsC,,C-P»C-Cḡ.*

*P†PjCáPSPSP° C†PëC†C,PμPjP°: PSPμC†P°C†C,Ps Bḡ“ P°PSP°C,,C-P»P°PeC,PëC†PSC- CḡPμP°PeC†C-C— (PrPëPI. CḡPsP·PrC-P»Pë B«PḡCḡPsC,PëPìPsPeP°P·P°PSPSCḡB»), B«PḡC†PsP±P»PëPIPSC†C,C- P·P°C†C,PsC†C†PIP°PSPSCḡB»), P°PSPiC-PsPSPμPICḡPsC,PëC†PSPëPNë PSP°P±CḡCḡPe.*

*PμC†PëC...C-C†PSC- PìPsCḡCáCëPμPSPSCḡ: CḡC-PrPePs Bḡ“ PrPμP»C-CḡC-PNë.*

*Pk°PμCḡPIPsPIP° C†PëC†C,PμPjP°: C†P°C†C,Ps Bḡ“ PìPsP»PsPIPSPëPNë P±C-P»Cḡ; PSPμC†P°C†C,Ps Bḡ“ PìP°CḡPμC†C,PμP·C-C—; CḡC-PrPePs Bḡ“ C†C†PrPsPjPë (PrPëPI. CḡPsP·PrC-P» B«PḡC†PsP±P»PëPIPSC†C,C- P·P°C†C,PsC†C†PIP°PSPSCḡB»).*

*PëP»CáPSPePsIPs-PePëCëPePsPIPëPNë C,CḡP°PeC,: C†P°C†C,Ps Bḡ“ PrC-P°CḡPμCḡ, P±C-P»Cḡ C† P¶PëPIPSC,C-, P±P»CḡPIP°PSPSCḡ, PSC†PrPsC,P°; PSPμC†P°C†C,Ps Bḡ“ P°PSC,PëP±C-PsC,PëPePsP°C†PsC†C-PNëPsPIP°PSPëPNë PePsP»C-C,, C† C,,C†. PìC†PμPIPPrPsPjPμPjP±CḡP°PSPsP·PSPëPNë PePsP»C-C, (PrPëPI. CḡPsP·PrC-P» B«PḡC†PsP±P»PëPIPSC†C,C- P·P°C†C,PsC†C†PIP°PSPSCḡB»).*

*P”PμPìP°C,PsP±C-P»C-P°CḡPSP° C†PëC†C,PμPjP°: C†P°C†C,Ps Bḡ“ PìC-PrPIPëC%°PμPSPSCḡ CḡC-PIPSC-PI C,CḡP°PSC†P°PjC-PSP°P·, P»C†P¶PSPsC— C,,PsC†C,,P°C,P°P·Pë, P»P°PeC,P°C,PrPμPiC-PrCḡPsPìPμPSP°P·Pë PI PeCḡPsPIC-; PSPμC†P°C†C,Ps Bḡ“ PjPμPrPëPeP°PjPμPSC,PsP·PSPs-C-PSPrC†PePsPIP°PSPμ C†CḡP°P¶PμPSPSCḡ PìPμC†C-PSPePë (DILI), PIPeP»CḡC†PSPs P· PìPμPìP°C,PëC,PsPj C,P° PìPμC†C-PSPePsPIPSCḡ PSPμPrPsC†C,P°C,PSC-C†C,Cḡ, PìC-PrPIPëC%°PμPSPSCḡ CḡC-PIPSC-PI P±C-P»C-CḡC†P±C-PSC† PI PeCḡPsPIC-.*

*PëPeC-CḡP° C,P° PìC-PrCëPeC-CḡPSP° PeP»C-C,PePsPIPëPSP°: C†P°C†C,Ps Bḡ“ PIPëC†PëPì, C†PIPμCḡP±C-P¶; PSPμC†P°C†C,Ps Bḡ“ C,PsPeC†PëC†PSPëPNë*





**PJPiP°PePsPIPeP°.** PüPs 500 PjPi P°P±Ps 1000 PjPi PíPsCḡPsC€PeCf Cí C„P»P°PePsPSC-; PíPs 1 C„P»P°PePsPSCf; PíPs 1 C„P»P°PePsPSCf PI PíP°C†C†C-.

**PḡP°C,PμPiPsCḡC-Cḡ PIC-PrPíCfCfPeCf.** P—P° CḡPμC†PμPíC,PsPj.

**P’PëCḡPsP±PSPëPe.**

PüCfP±P»C-C†PSPμ P°PeC†C-PsPSPμCḡPSPμ C,PsPIP°CḡPëCfC,PIPs B«PáP°CfPePsPIPs-PIPëCḡPsP±PSPëC†PëPNḡ C†PμPSC,Cḡ B«P’PsCḡC%oP°PiC-PICfCḡPëPëPNḡ C...C-PjC-PePs-C„P°CḡPjP°C†PμPIC,PëC†PSPëPNḡ P·P°PIPsPrB».

**PḡC-CfC†PμP·PSP°C...PsPrP¶PμPSPSCḡ PIPëCḡPsP±PSPëPeP° C,P° P°PrCḡPμCfP° PjC-CfC†Cḡ PíCḡPsPIP°PrP¶PμPSPSCḡ PNḡPsPiPs PrC-CḡP»CḡPSPScfC,C-.**

PJPeCḡP°C—PSP°, 03134, Pj. PḡPëC—PI, PICfP». PḡPëCḡCf, 17.

**P”P°C,P° PsCfC,P°PSPSCHḡPsPiPs PíPμCḡPμPiP»CḡPrCf.**