```
                                (((((((.....((((..((((...(((........)))...)))))..)))))(((((...
chr-14.trna24-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-3.trna24-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-3.trna23-Glu-CTC     UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-3.trna25-Glu-CTC     UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-6.trna83-Glu-CTC     UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-8.trna135-Glu-CTC    UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-9.trna34-Glu-CTC     UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-14.trna76-Glu-CTC    UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-14.trna12-Glu-CTC    UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-14.trna21-Glu-CTC    UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-14.trna25-Glu-CTC    UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-14.trna74-Glu-CTC    UUCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-14.trna26-Glu-CTC    UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-10.trna69-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-3.trna26-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-4.trna73-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-4.trna134-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-11.trna118-Glu-CTC   UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-11.trna117-Glu-CTC   UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-11.trna37-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-4.trna165-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-4.trna166-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-5.trna69-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-14.trna20-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-9.trna151-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-14.trna18-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-13.trna71-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-8.trna136-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-6.trna82-Glu-CTC     UCCGUUGUA----GUUUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-4.trna132-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUCAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-9.trna2-Glu-CTC      UCCGUUGUA----GUCUAGUUGGUCAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-13.trna72-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUCAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-10.trna174-Glu-CTC   UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUU 56
chr-4.trna133-Glu-CTC    UCCGUUGUA----GUCUAGUCGGUCAGGAUACUUGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-4.trna172-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUCAGGAUACUCGGCUCUCACCUGAGAGACCCGGGUUC 56
chr-14.trna72-Glu-CTC    UCCGUUGUA----GGCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGAUC 56
chr-4.trna72-Glu-CTC     UCCGUUGUA----GUCUAGUCGGUUAGGAUACUGGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-4.trna173-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCAGGUUC 56
chr-4.trna107-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-14.trna19-Glu-CTC    UCCGUUGUA----GUCUAGUCGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-4.trna99-Glu-CTC     UCCGUUGUA----GUGUAGUUGGUUAGGAUACUUGGCUCUCACCAGAGAGACCCGGGUUC 56
chr-13.trna73-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-4.trna76-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUUAGGAUACUCGGCUCUCACCCGAGAGACCCGGGUUC 56
chr-14.trna13-Glu-CTC    UCUGUUGUA----GUCUAGUUGGUUAGGAUACUCGACUCUCACCCAAGAGACCCGGGUUC 56
chr-14.trna60-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-1.trna90-Glu-CTC     UCCGUUGUA----GUCUAGUCGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-15.trna178-Glu-CTC   UCCGUUGUA----GUCUAGUCGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-6.trna21-Glu-CTC     UCCGUUGUA----GUCUAGUCGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-6.trna22-Glu-CTC     UCCGUUGUA----GUCUAGUCGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-7.trna81-Glu-CTC     UCCGUUGUA----GUCUAGUCGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-7.trna194-Glu-CTC    UCCGUUGUA----GUCUAGUCGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-10.trna147-Glu-CTC   UCCGUUGUA----GUCUAGUCGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-11.trna225-Glu-CTC   UCCGUUGUA----GUCUAGUCGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-11.trna227-Glu-CTC   UCCGUUGUA----GUCUAGUCGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-1.trna91-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-2.trna25-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-8.trna239-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-2.trna26-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-8.trna218-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-15.trna162-Glu-CTC   UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-8.trna240-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-7.trna190-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-13.trna96-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-6.trna180-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-6.trna179-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-4.trna156-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-15.trna177-Glu-CTC   UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-10.trna65-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-6.trna178-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUUGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-13.trna95-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUUGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-6.trna190-Glu-CTC    UCCGUUGUA----GUCUAGUCGGUUAGGAUAUUUGGCUCUCACCUGAAAGACCCGGGUUC 56
chr-1.trna61-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUCAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-8.trna217-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-8.trna4-Glu-CTC      UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-4.trna206-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-2.trna28-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGUAAGACCCGGGUUC 56
chr-4.trna15-Glu-CTC     UCCGUUGUA----GUCUAGUUGGUCAGGAUAUUCGGCUCUCACCCGAAAGACCCGGGUUC 56
chr-8.trna11-Glu-CTC     UCUGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCUGG-UUC 55
chr-13.trna93-Glu-CTC    UCCGUUGUA----GUCUAGUUGGUUAGGAUAUUCGGCUCUCACCCGAAAGACCUGGGUUC 56
chr-14.trna75-Glu-CTC    UCUGUUGUA----CUCUAGCUGGUUAGGAUAGUCAGCUCUCACCCGAGAGACCCUGGUUU 56
chr-11.trna122-Glu-CTC   UCCGUUGUU----GUCUAGCUGGUUAGGAUAUUCGGCUCUCACUCGAAAGAUGCGGGUUC 56
chr-4.trna106-Glu-CTC    UCUGUUGUA----GUCUAGUUGGUUAGGAUACUUCGGCUCUCACCUGAGAGA-----GUUC 51
chr-10.trna68-Glu-CTC    AGUUCCAAACAAUGUCUAGUUGGUUAGGAUACUUGGCUCUCACCCAAGAUACCCGGGUUC 60
                         .........10........20........30........40........50.........
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                         ....))))))...)))))))..).
chr-14.trna24-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-3.trna24-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-3.trna23-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-3.trna25-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-6.trna83-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-8.trna135-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-9.trna34-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-14.trna76-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-14.trna12-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-14.trna21-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-14.trna25-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-14.trna74-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-14.trna26-Glu-CTC    GAUUCCCGG---CGACGG-AA 73
chr-10.trna69-Glu-CTC    GAUUCUCGG---CAACGG-AA 73
chr-3.trna26-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-4.trna73-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-4.trna134-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-11.trna118-Glu-CTC   GAUUCCCGG---CAACGG-AA 73
chr-11.trna117-Glu-CTC   GAUUCCCGG---CAACGG-AA 73
chr-11.trna37-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-4.trna165-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-4.trna166-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-5.trna69-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-14.trna20-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-9.trna151-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-14.trna18-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-13.trna71-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-8.trna136-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-6.trna82-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-4.trna132-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-9.trna2-Glu-CTC      GAUUCCCGG---CAACGG-AA 73
chr-13.trna72-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-10.trna174-Glu-CTC   GAUUCCCGG---CAAUGG-AA 73
chr-4.trna133-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-4.trna172-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-14.trna72-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-4.trna72-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-4.trna173-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-4.trna107-Glu-CTC    GAUUCCCGG---CAACAG-AA 73
chr-14.trna19-Glu-CTC    GAUUCCCGU---CCACGG-AA 73
chr-4.trna99-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-13.trna73-Glu-CTC    GAUUCCC-G---CAACGG-AA 72
chr-4.trna76-Glu-CTC     GAUUUCCGG---CAACGGUAA 74
chr-14.trna13-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-14.trna60-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-1.trna90-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-15.trna178-Glu-CTC   GAUUCCCGG---CAACGG-AA 73
chr-6.trna21-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-6.trna22-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-7.trna81-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-7.trna194-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-10.trna147-Glu-CTC   GAUUCCCGG---CAACGG-AA 73
chr-11.trna225-Glu-CTC   GAUUCCCGG---CAACGG-AA 73
chr-11.trna227-Glu-CTC   GAUUCCCGG---CAACGG-AA 73
chr-1.trna91-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-2.trna25-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-8.trna239-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-2.trna26-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-8.trna218-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-15.trna162-Glu-CTC   GAUUCCCGG---CAACGG-AA 73
chr-8.trna240-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-7.trna190-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-13.trna96-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-6.trna180-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-6.trna179-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-4.trna156-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-15.trna177-Glu-CTC   GAUUCCCGG---CAACGG-AA 73
chr-10.trna65-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-6.trna178-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-13.trna95-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-6.trna190-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-1.trna61-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-8.trna217-Glu-CTC    AAUUCCCGG---CAACGG-AA 73
chr-8.trna4-Glu-CTC      AAUUCCCGG---CAACGG-AA 73
chr-4.trna206-Glu-CTC    AAUUCCCGG---CAAUGG-GA 73
chr-2.trna28-Glu-CTC     GAUUCCCGG---CAACGG-AA 73
chr-4.trna15-Glu-CTC     AAGUCCCGG---CAACGG-AA 73
chr-8.trna11-Glu-CTC     AAUUCCCGG---CAACGG-AA 72
chr-13.trna93-Glu-CTC    GAUUCCCGG---CAACGG-AA 73
chr-14.trna75-Glu-CTC    GAUUCCCGG---CAACAG-AA 73
chr-11.trna122-Glu-CTC   AAUUCCCGG---CAAUGG-AA 73
chr-4.trna106-Glu-CTC    AAUUCCCGG---CAACGG-AA 68
chr-10.trna68-Glu-CTC    GAUUCCCGGCAAUGGAAU-UG 80
                         .........70........80
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