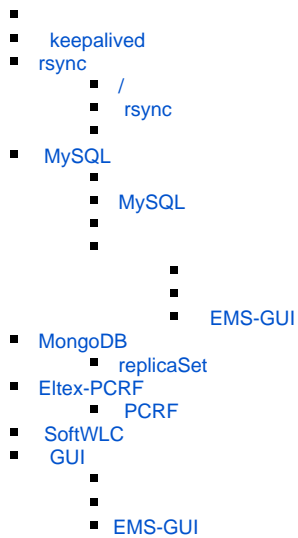


# v1.14\_ SoftWLC



SoftWLC master-slave. ( , , ), MySQL ( master-master), MongoDB, DHCP . , , .

```
ip- <ip_server1>, <ip_server2> <virtual_ip>, :
```

- <ip\_server1> - ip-
- <ip\_server2> - ip-
- <virtual\_ip> - ip-

SoftWLC :

- keepalived
- rsync
- MySQL
- replicaSet MongoDB
- Eltex-PCRf
- IP

keepalived

: v1.14\_keepalived\_1.3.6

. . keepalived Wi-Fi .

## rsync

Rsync      Eltex-EMS   Eltex-APB,   ,   ,   . Rsync   .   master-   slave- .

/

```
rsync /etc/default/rsync :
RSYNC_ENABLE=true
```

$$\vdots$$

```
root@swlc01-server:/# service rsync start
```

:

```
root@swlc01-server:/# service rsync stop
```

— ,:

```
root@swlc01-server:/# service rsync status
```

:

```
* rsync is running
```

,

```
* rsync is not running
```

.

## rsync

```
rsync /etc/rsyncd.conf .
```

## /etc/rsyncd.conf

```
[ems-conf]
path = /usr/lib/eltex-ems/conf/
use chroot = no
max connections = 2
lock file = /var/lock/rsyncd
read only = no
list = no
uid = root
auth users = backup
secrets file = /etc/rsyncd.secrets
strict modes = yes
# IP- , , ..
hosts allow = <ip_server1> <virtual_ip>
ignore errors = no
ignore nonreadable = yes
transfer logging = no
timeout = 60
refuse options = checksum dry-run
dont compress = *.gz *.tgz *.zip *.z *.rpm *.deb *.iso *.bz2 *.tbz
```

```
[ems-tftp]
path = /tftpboot
use chroot = no
max connections = 2
lock file = /var/lock/rsyncd.tftp
read only = no
list = no
uid = root
auth users = backup
secrets file = /etc/rsyncd.secrets
strict modes = yes
hosts allow = <ip_server1> <virtual_ip>
ignore errors = no
ignore nonreadable = yes
transfer logging = no
timeout = 60
refuse options = checksum dry-run
dont compress = *.gz *.tgz *.zip *.z *.rpm *.deb *.iso *.bz2 *.tbz
```

```
[ems-wp]
path = /var/ems-data/WP
use chroot = no
max connections = 2
lock file = /var/lock/rsyncd.ems-wp
read only = no
list = no
uid = root
auth users = backup
secrets file = /etc/rsyncd.secrets
strict modes = yes
hosts allow = 10.62.8.121 10.62.8.122
ignore errors = no
ignore nonreadable = yes
transfer logging = no
timeout = 60
refuse options = checksum dry-run
dont compress = *.gz *.tgz *.zip *.z *.rpm *.deb *.iso *.bz2 *.tbz
```

**hosts allow** master .

hosts allow = <ip\_\_> <virtual ip>

**rsync** , /etc/rsyncd.secrets, .

backup:rspasswd

, :

```
root@swlc01-server:/# chmod 600 /etc/rsyncd.secrets
```

**/etc/rsync\_client.secrets, :**

```
root@swlc01-server:/# echo "rpasswd" > /etc/rsync_client.secrets && chmod 600 /etc/rsync_client.secrets
```

**cron, /usr/lib/eltex-ems/scripts/rsync\_ems\_backup.sh. rsync (backup). , master.**

**/usr/lib/eltex-ems/scripts/rsync\_ems\_backup.sh**

```
#!/bin/bash

LOCKFILE="/run/lock/rsync_ems_backup"

# IP address backup server
HOST=<ip_server2>
# Check if we're root
if [ `whoami` != "root" ]
then
    echo "This script should be run by root."
    exit 1
fi

# Check and create lock file
if ! lockfile-create --use-pid -r 0 $LOCKFILE &> /dev/null ; then
    echo "Backup is already running"
    exit 0
fi

# Check - if we're master - try to perform backup to slave
SRVMODE=`cat /tmp/keep.mode`
if [ "$SRVMODE" == "MASTER" ]
then
    rsync -urlogtp --delete-after --password-file=/etc/rsync_client.secrets /usr/lib/eltex-ems/conf/
    backup@$HOST::ems-conf > /tmp/rsync_ems_conf.log 2>&1
    echo $? >> /tmp/rsync_ems_conf_result.log
    rsync -urlogtp --delete-after --password-file=/etc/rsync_client.secrets /tftpboot/ backup@$HOST::ems-
    tftp > /tmp/rsync_ems_tftpboot.log 2>&1
    echo $? >> /tmp/rsync_ems_tftpboot_result.log
    rsync -urlogtp --delete-after --password-file=/etc/rsync_client.secrets /var/ems-data/WP/ backup@$HOST::ems-
    wp > /tmp/rsync_ems_wp.log 2>&1
    echo $? >> /tmp/rsync_ems_wp_result.log
else
    echo "Not master. No action will be performed."
fi

lockfile-remove $LOCKFILE
```

- **backup-**, **/etc/rsyncd.secrets**
- **HOST** - ip-

**C cron :**

```
root@swlc01-server:/# crontab -l | { cat; echo "*/1 * * * * /usr/lib/eltex-ems/scripts/rsync_ems_backup.sh"; }
| crontab
```

## MySQL

, MySQL, master-master (-), master slave. , . , . (<http://dev.mysql.com/doc/refman/5.5/en/replication.html>). , .

( MySQL ) . **mysqldump**.

, , :

```
root@swlc01-server:/# mysql -uroot -proot -e "FLUSH TABLES WITH READ LOCK;"
root@swlc01-server:/# mysqldump -uroot -proot --databases ELTEX_PORTAL eltex_alert eltex_auth_service eltex_ems
payments radius wireless > mysqldump_master.sql
root@swlc01-server:/# mysql -uroot -proot -e "UNLOCK TABLES;"
root@swlc01-server:/# scp mysqldump_master.sql <username>@<ip_server2>:/home/<username>/
```

dump :

```
root@swlc01-server:/# mysql -uroot -proot < /home/<username>/mysqldump_master.sql
```

## MySQL

mysqld . , .

[mysqld] /etc/mysql/my.cnf :

:

```
bind-address = 127.0.0.1
```

**server-id** , , :

```
server-id = 1
```

:

```
server-id = 2
```

:

```
log_bin = /var/log/mysql/mysql-bin.log
```

**auto\_increment\_increment** ( ) **auto\_increment\_offset** ( ).

:

```
auto_increment_increment= 2
auto_increment_offset = 1
```

:

```
auto_increment_increment= 2
auto_increment_offset = 2
```

—:

- , :

```
binlog-do-db = eltex_alert
binlog-do-db = eltex_ems
binlog-do-db = wireless
binlog-do-db = radius
binlog-do-db = eltex_auth_service
binlog-do-db = ELTEX_PORTAL
binlog-do-db = payments
```

- y, :

```
binlog-ignore-db = mysql
binlog-ignore-db = Syslog
binlog-ignore-db = performance_schema
binlog-ignore-db = information_schema
```

**mysql** .

```
root@swlc01-server:/# service mysql restart
```

. master .

:

```
GRANT SELECT, REPLICATION SLAVE, REPLICATION CLIENT ON *.* TO 'replication'@'<ip_server2>' IDENTIFIED BY
'password';
FLUSH PRIVILEGES;
```

:

```
GRANT SELECT, REPLICATION SLAVE, REPLICATION CLIENT ON *.* TO 'replication'@'<ip_server1>' IDENTIFIED BY
'password';
FLUSH PRIVILEGES;
```

 SELECT GUI EMS

MySQL **show master status** :

```
mysql> show master status \G
```

```
***** 1. row *****
      File: mysql-bin.000001
      Position: 00000107
      Binlog_Do_DB: eltex_alert,eltex_ems,radius,wireless,eltex_auth_service,payments,ELTEX_PORTAL
      Binlog_Ignore_DB: mysql,Syslog,performance_schema,information_schema
1 row in set (0.00 sec)
```

#### File Position.



Position 107.   .

(   ):

```
mysql> STOP SLAVE;
mysql> CHANGE MASTER TO MASTER_HOST='<ip_server1>', MASTER_USER='replication', MASTER_PASSWORD='password',
MASTER_LOG_FILE='mysql-bin.000001', MASTER_LOG_POS=107;
mysql> START SLAVE;
```

- MASTER\_LOG\_FILE='mysql-bin.000001' – File,   .
- MASTER\_LOG\_POS=107 – Position,   (   107).

:

```
mysql> show slave status \G
***** 1. row *****
      Slave_IO_State: Waiting for master to send event
      Master_Host: <ip_server1>
      Master_User: replication
      Master_Port: 3306
      Connect_Retry: 60
      Master_Log_File: mysql-bin.000001
      Read_Master_Log_Pos: 107
      Relay_Log_File: mysqld-relay-bin.000001
      Relay_Log_Pos: 107
      Relay_Master_Log_File: mysql-bin.000001
      Slave_IO_Running: Yes
      Slave_SQL_Running: Yes
      Replicate_Do_DB:
      Replicate_Ignore_DB:
      Replicate_Do_Table:
      Replicate_Ignore_Table:
      Replicate_Wild_Do_Table:
      Replicate_Wild_Ignore_Table:
      Last_Errno: 0
      Last_Error:
      Skip_Counter: 0
      Exec_Master_Log_Pos: 107
      Relay_Log_Space: 107
      Until_Condition: None
      Until_Log_File:
      Until_Log_Pos: 0
      Master_SSL_Allowed: No
      Master_SSL_CA_File:
      Master_SSL_CA_Path:
      Master_SSL_Cert:
      Master_SSL_Cipher:
      Master_SSL_Key:
      Seconds_Behind_Master: 0
Master_SSL_Verify_Server_Cert: No
      Last_IO_Errno: 0
      Last_IO_Error:
      Last_SQL_Errno: 0
      Last_SQL_Error:
      Replicate_Ignore_Server_Ids:
      Master_Server_Id: 2
1 row in set (0.00 sec)
```

**Slave\_IO\_Running Slave\_SQL\_Running «Yes», .**

:

```
show master status \G
mysql> show master status \G
***** 1. row *****
      File: mysql-bin.000001
      Position: 0000107
      Binlog_Do_DB: eltex_alert,eltex_ems,eltex_ont,radius,wireless,eltex_auth_service,payments,ELTEX_PORTAL
      Binlog_Ignore_DB: mysql,Syslog,performance_schema,information_schema
1 row in set (0.00 sec)
```

( ):



```
CHANGE MASTER TO MASTER_HOST='<ip_server2>', MASTER_USER='replication', MASTER_PASSWORD='password',
MASTER_LOG_FILE='mysql-bin.000001', MASTER_LOG_POS=107;
START SLAVE;
```

:

```
mysql> show slave status \G
***** 1. row *****
      Slave_IO_State: Waiting for master to send event
      Master_Host: <ip_server2>
      Master_User: replication
      Master_Port: 3306
      Connect_Retry: 60
      Master_Log_File: mysql-bin.000001
      Read_Master_Log_Pos: 107
      Relay_Log_File: mysqld-relay-bin.000001
      Relay_Log_Pos: 107
      Relay_Master_Log_File: mysql-bin.000001
      Slave_IO_Running: Yes
      Slave_SQL_Running: Yes
      ...
```

,

Slave\_IO\_Running Slave\_SQL\_Running «Yes», Master\_Log\_File Read\_Master\_Log\_Pos .

## EMS-GUI

MySQL GUI EMS. /etc/eltex-ems/check-ems-replication.conf. .

### /etc/eltex-ems/check-ems-replication.conf

```
# ("Yes") / ("No")
ENABLE_REPLICATION="Yes"

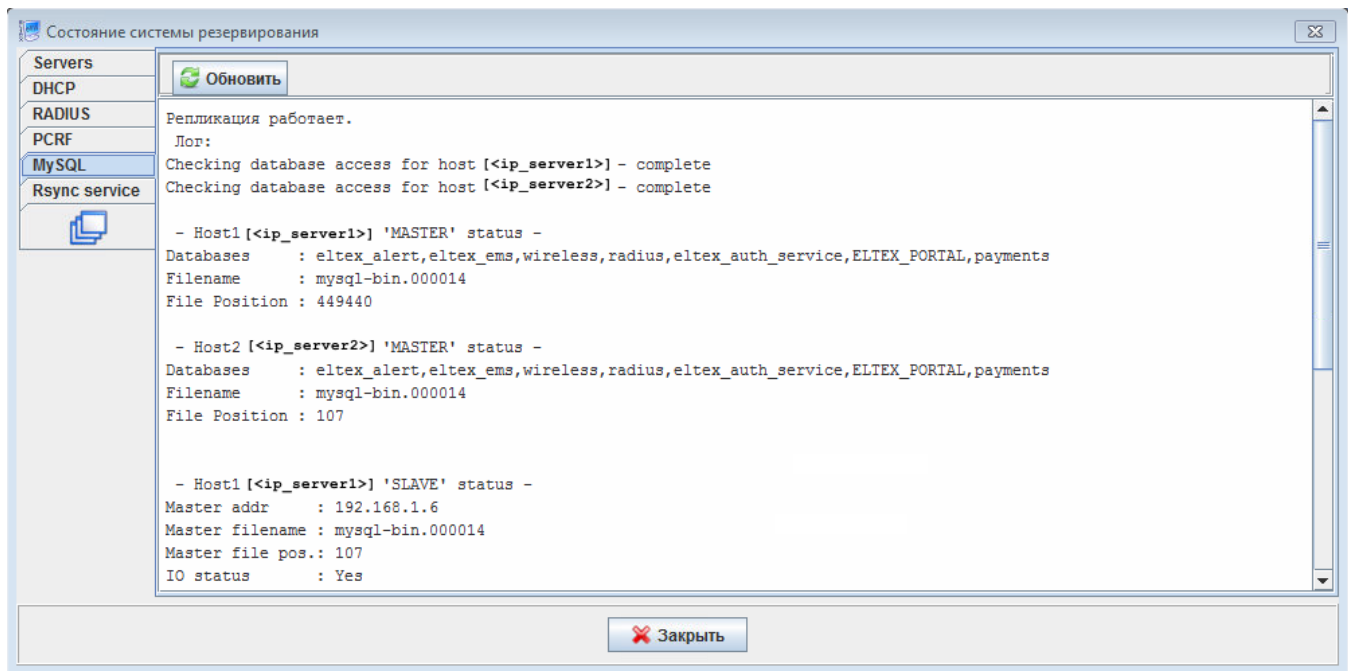
#
HOST1=<ip_server1>
#
HOST2=<ip_server2>

# mysql
# mysql
USER="replication"
# mysql
PASSWORD="password"
```

,

- **ENABLE\_REPLICATION** - ("Yes")
- **HOST1, HOST2** - ip-
- **USER, PASSWORD** - / , .

, GUI EMS MySQL.



## MongoDB

MongoDB ( - 3) Replica Set. Replica Set primary secondary ( <https://docs.mongodb.com/v2.4/administration/replica-sets/>). primary. MongoDB failover primary , primary . 3+ replica set.



Replica Set ( secondary).

### replicaSet

, secondary:

```
echo "rs.slaveOk()" | sudo tee -a /etc/mongorc.js
```

/etc/mongodb.conf :

```
replSet = <replica_set_name>
```

<replica\_set\_name> replica set, ,

```
# bind_ip = 127.0.0.1
```

MongoDB

```
root@swlc01-server:/# service mongodb restart
```

MongoDB

```
root@swlc01-server:/# mongo
```

replica set

```
> rs.initiate()
```

, shell :

```
replica_set_name:PRIMARY>
```

DNS ,      Replica Set:

```
replica_set_name:PRIMARY> rs.config()
{
  "_id" : "relica_set_name",
  "version" : 63243,
  "members" : [
    {
      "_id" : 0,
      "host" : "<hostname_server1>:27017"
    }
  ]
}
```



(0) hostname ip-,      DNS    Replica Set    . DNS    DNS ,    .

:

```
replica_set_name:PRIMARY> conf = rs.conf()
replica_set_name:PRIMARY> conf.members[<>].host = "<ip_server1>:27017"
replica_set_name:PRIMARY> rs.reconfig(conf)
```

:

```
replica_set_name:PRIMARY> rs.config()
{
  "_id" : "relica_set_name",
  "version" : 63243,
  "members" : [
    {
      "_id" : 0,
      "host" : "<ip_server1>:27017"
    }
  ]
}
```

**"host"** ip- .

Replica Set ( ):

```
replica_set_name:PRIMARY> rs.add("<ip_server2>")
{ "ok" : 1 }
```

```
MongoDB , , ( bind_ip = 127.0.0.1), replSet. .  
MongoDB :
```

```
root@swlc01-server:/# mongo  
replica_set_name:SECONDARY>
```

Replica Set MongoDB **rs.status()**

## Eltex-PCRF

### PCRF

PCRF 5701 tcp, 5801 tcp

```
/etc/eltex-pcrf/hazelcast-cluster-network.xml ( 5 22 - , 14-15 - )  
, :
```

```
<network>  
  <!-- Write here public address of the node -->  
  
  <!--      -->  
  <public-address>ip_server1</public-address>  
  <port auto-increment="false" port-count="100">5701</port>  
  <outbound-ports>  
    <ports>0</ports>  
  </outbound-ports>  
  <join>  
    <multicast enabled="false"/>  
    <tcp-ip enabled="true">  
      <!-- IP-      ( ) -->  
      <member>ip_server1</member>  
      <member>ip_server2</member>  
    </tcp-ip>  
    <discovery-strategies>  
    </discovery-strategies>  
  </join>  
  <interfaces enabled="true">  
    <!--      -->  
    <interface>ip_server1</interface>  
  </interfaces>
```

/etc/eltex-pcrf/eltex-pcrf.json :

```
"cluster.enable" : true,
```

Eltex-PCRF

```
root@swlc01-server:/# service eltex-pcrf restart
```

- [http://<ip\\_server1>:7070/cluster](http://<ip_server1>:7070/cluster)
- [http://<ip\\_server2>:7070/cluster](http://<ip_server2>:7070/cluster)

```
{
  "data" : {
    "enabled" : true,
    "state" : "ACTIVE",
    "members" : [ {
      "address" : "ip_server1",
      "local" : true,
      "active" : true
    }, {
      "address" : "ip_server2",
      "local" : false,
      "active" : true
    } ],
    "messagesStats" : {
      "received" : 45157,
      "sent" : 45144
    },
    "mongo" : {
      "available" : false,
      "error" : "not running with --replSet"
    }
  },
  "key" : "PcrfErrorCode.success",
  "message" : "Success",
  "code" : 0,
  "args" : [ ]
}
```

## SoftWLC

SoftWLC    virtual ip    .    .

### /etc/eltex-apb/apb.properties

```
mercury.host=localhost
mercury.port=6565
mercury.pool.size=100

# Config filePath to cache
cache.config=/etc/eltex-apb/ehcache.xml

# list of permitted files to
hosts.file=/etc/eltex-apb/hosts.json

# Timeout waiting for subscribe-request after connecting the access point to the server, in seconds
subscribe.idle.timeout=60

# Maximum count of outgoing messages to queue for each session
session.outgoingQueue=100
nbi.client.login=admin
nbi.client.password=password
```

- localhost <virtual\_ip> 1.

### /etc/eltex-pcrf/eltex-pcrf.json

```
{
  "auth.address" : "0.0.0.0",
  "auth.port" : 31812,
  "auth.mac.open.timeout.s" : 3600,
  "auth.mac.welcome.service" : "WELCOME",

  "acct.address" : "0.0.0.0",
  "acct.port" : 31813,
```

```

"lease.saver.address" : "0.0.0.0",
"lease.saver.port" : 4381,

"aaa.instances" : 5,
"aaa.host" : "127.0.0.1",
"aaa.secret" : "testing123",
"aaa.auth.port" : 1812,
"aaa.acct.port" : 1813,
"aaa.rest.port" : 7080,
"aaa.timeout" : 10,
"aaa.attempts" : 1,

"web.monitoring.port" : 7070,

"cluster.enable" : false,
"cluster.eventBusPort" : 5801,

"radius" : {
  "url" : "jdbc:mysql://localhost/radius?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000&autoReconnect=true",
  "user" : "javauser",
  "password" : "javapassword",
  "max_pool_size" : 16
},

"mongo.pcrf" : {
  "connection_string" : "mongodb://localhost:27017/pcrf",
  "db_name" : "pcrf"
},

"session.storage" : {
  "session.check.period.s" : 300,
  "unauth.store.time.s" : 600,
  "interval.number.expired" : 3,
  "min.interval.s" : 45,
  "default.interval.s" : 600
},

"bras.coa" : {
  "coa.timeout" : 10,
  "coa.attempts" : 1,
  "remote.coa.port" : 3799,
  "executor.size" : 100,
  "log.clean.period.s" : 600,
  "log.store.period" : {
    "period" : 14,
    "unit" : "D"
  }
},

"sql.ems" : {
  "url" : "jdbc:mysql://localhost/eltex_ems?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000&autoReconnect=true",
  "user" : "javauser",
  "password" : "javapassword",
  "max_pool_size" : 16
},

"sql.wireless" : {
  "url" : "jdbc:mysql://localhost/wireless?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000&autoReconnect=true",
  "user" : "javauser",
  "password" : "javapassword",
  "max_pool_size" : 16
}
}

```

- **localhost** <virtualip> 28,35,61,68.

#### /etc/eltex-portal-constructor/application.conf

```
auth-service {
    host = localhost
    port = 21812
    timeout = 10s
    retries = 3
    secret = eltex
    # pap, chap, mschapv2
    protocol = pap
}

login {
    #
    maxAttemptsLogin = 3
    maxAttemptsIP = 5
    #
    blockTime = 5m
}

database {
    host = localhost
    port = 3306
    name = ELTEX_PORTAL
    user = javauser
    password = javapassword

    pool {
        # Time to wait for a connection
        connectionTimeout = 10s
        # Time to wait for connection validation
        validationTimeout = 3s

        min = 1
        max = 10
    }

    cache {
        # Limit of cached simple entries count (for each query type)
        maxEntries = 1000
        # Limit of total cached portal resources size
        maxResourceBytes = 32m
        # Maximum time to retain items in the cache
        expireTime = 30s
    }
}

sso {
    enabled = false

    rest {
        scheme = http
        host = localhost
        port = 80
        sso_api_path = /apiman-gateway/b2b_test
    }
    auth {
        scheme = http
        host = localhost
        port = 80
        authentication_path = /auth/realms/b2b/protocol/openid-connect/auth
        logout_path = /auth/realms/b2b/protocol/openid-connect/logout
    }
}
```

```

    params {
        client_id = id
        # URL of epadmin, URL must be in double quotes (!!!)
        redirect_uri = "http://localhost:8080/epadmin/sso"
        client_secret = secret
    }
}

jetty {
    https {
        port = 9444
        keystorePass = 12345
        keystoreFile = /etc/eltex-portal-constructor/localhost.pfx
        keystoreType = PKCS12
        keyAlias = 1
        ciphers = [
            TLS_RSA_WITH_AES_128_CBC_SHA256
            TLS_RSA_WITH_AES_128_CBC_SHA
            TLS_RSA_WITH_AES_256_CBC_SHA256
            TLS_RSA_WITH_AES_256_CBC_SHA
        ]
    }
}

validation {
    //    public_key = /etc/eltex-doors/keys/public.pem
}

```

localhost <virtualip> 2,23.



### /etc/eltex-portal/application.conf

```
portal {
  defaultRedirectUrl = "http://eltex-co.ru"
  tariffCheckerPeriod = 1440
}

jetty {
  https {
    port = 9443
    keystorePass = 12345
    keystoreFile = /etc/eltex-portal/localhost.pfx
    keystoreType = PKCS12
    keyAlias = 1
    ciphers = [
      TLS_RSA_WITH_AES_128_CBC_SHA256
      TLS_RSA_WITH_AES_128_CBC_SHA
      TLS_RSA_WITH_AES_256_CBC_SHA256
      TLS_RSA_WITH_AES_256_CBC_SHA
    ]
  }
}

database {
  host = localhost
  port = 3306
  name = ELTEX_PORTAL
  user = javauser
  password = javapassword

  readOnly = true

  pool {
    # Time to wait for a connection
    connectionTimeout = 10s
    # Time to wait for connection validation
    validationTimeout = 3s

    min = 1
    max = 10
  }

  cache {
    # Limit of cached simple entries count (for each query type)
    maxEntries = 1000
    # Limit of total cached portal resources size
    maxResourceBytes = 32m
    # Maximum time to retain items in the cache
    expireTime = 2m
  }
}
```

localhost <virtualip> 25.

### /etc/eltex-radius-nbi/radius\_nbi\_config.txt

```
# DB radius(alias=radius)
radius.jdbc.driver=org.gjt.mm.mysql.Driver
radius.jdbc.dbUrl=jdbc:mysql://localhost/radius?
zeroDateTimeBehavior=convertToNull&useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000
radius.jdbc.username=javauser
radius.jdbc.password=javapassword
radius.jdbc.maxPoolSize=48
radius.jdbc.inUse=yes
```

```
# DB ems(alias=ems)
ems.jdbc.driver=org.gjt.mm.mysql.Driver
ems.jdbc.dbUrl=jdbc:mysql://localhost/eltex_ems?
zeroDateTimeBehavior=convertToNull&useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=50
00&noAccessToProcedureBodies=true
ems.jdbc.username=javauser
ems.jdbc.password=javapassword
ems.jdbc.maxPoolSize=48
ems.jdbc.inUse=yes

# DB wireless (alias=wireless)
wireless.jdbc.driver=org.gjt.mm.mysql.Driver
wireless.jdbc.dbUrl=jdbc:mysql://localhost/wireless?
zeroDateTimeBehavior=convertToNull&useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=50
00
wireless.jdbc.username=javauser
wireless.jdbc.password=javapassword
wireless.jdbc.maxPoolSize=48
wireless.jdbc.inUse=yes

# DB logs (alias=logs)
logs.jdbc.driver=org.gjt.mm.mysql.Driver
logs.jdbc.dbUrl=jdbc:mysql://localhost/eltex_alert?
zeroDateTimeBehavior=convertToNull&useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=50
00
logs.jdbc.username=javauser
logs.jdbc.password=javapassword
logs.jdbc.maxPoolSize=48
logs.jdbc.inUse=yes

# DB logs (alias=eltex_auth_service)
eltex_auth_service.jdbc.driver=org.gjt.mm.mysql.Driver
eltex_auth_service.jdbc.dbUrl=jdbc:mysql://localhost/eltex_auth_service?
zeroDateTimeBehavior=convertToNull&useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=50
00
eltex_auth_service.jdbc.username=javauser
eltex_auth_service.jdbc.password=javapassword
eltex_auth_service.jdbc.maxPoolSize=48
eltex_auth_service.jdbc.inUse=no

# ems-northbound
ems.nbi.host=127.0.0.1
ems.nbi.port=8080
ems.nbi.path=northbound
ems.nbi.protocol=http

# eltex_auth_service
auth.port=22
auth.host=127.0.0.1
auth.username=username
auth.password=password

# freeradius-domain-1
freeradius-domain-1.port=22
freeradius-domain-1.host=192.168.0.1
freeradius-domain-1.username=username
freeradius-domain-1.password=password

# freeradius-domain-2
freeradius-domain-2.port=22
freeradius-domain-2.host=192.168.0.2
freeradius-domain-2.username=username
freeradius-domain-2.password=password

# tomcat url
tomcat.host=172.27.1.18
tomcat.port=8080

# pcrf stuff
pcrf.enabled=true
```

```

pcrf.url=http://localhost:7070
pcrf.username=admin
pcrf.password=password

# pcrf mongodb connector
pcrf.mongodb.enabled=true
pcrf.mongodb.uri=mongodb://localhost:27017/pcrf

# wifi-customer-cab mongodb connector
wificab.mongodb.enabled=true
wificab.mongodb.uri=mongodb://localhost:27017/wifi-customer-cab

# Eltex.SORM2.replicator MongoDB 'sorm2' connect
sorm2.mongodb.enabled=false
sorm2.mongodb.uri=mongodb://localhost:27017/sorm2

# Eltex.SORM2.replicator host to use API
sorm2.enabled=false
sorm2.url=http://localhost:7071
sorm2.username=admin
sorm2.password=password

#It enables records export to SORM3 while editing wifi users
sorm3.enabled=false

#####
#####DB ELTEX_PORTAL settings#####
#####
portal.db.driver=com.mysql.jdbc.Driver
portal.db.dialect=org.hibernate.dialect.MySQL5Dialect
portal.db.url=jdbc:mysql://localhost:3306/ELTEX_PORTAL?
max_allowed_packet=32362048&useUnicode=true&characterEncoding=utf8
portal.db.username=javauser
portal.db.password=javapassword
portal.hibernate.use_second_level_cache=false
portal.hibernate.use_query_cache=false

```

- localhost [<virtualip>](#) 3, 11, 19, 27, 35, 71, 77, 81, 85, 101
- 127.0.0.1 [<virtualip>](#) 49, 66

## **/etc/eltex-ngw/notification.properties**

```
#Common gates settings
#Current gate used for each type (config name, for example smpp_gate.conf)
sms.gate.outgoing.sms.config=smsc_gate.conf
#For incoming sms/calls fields for numbers in configs should be set
sms.gate.incoming.sms.config=
sms.gate.incoming.call.config=

#Gate pool settings
sms.gate.pool.size=50
sms.gate.pool.wait.millis=5000

#Port to listen for requests
server.port=8040

#=====
#=====database settings=====
#=====
#mongodb.uri=mongodb://192.168.1.1,192.168.1.2:27017/notification-gw
mongodb.host=localhost
mongodb.port=27017
#mongodb.user=user
#mongodb.password=password
mongodb.name=notification-gw

#=====
#=====email settings=====
#=====
mail.smtp.submitter=test@email.com
mail.smtp.password=
mail.smtp.auth=true
mail.smtp.host=email.com
mail.smtp.port=587
mail.smtp.sendpartial=true
mail.smtp.starttls.enable=false
mail.smtp.connectiontimeout=5000
mail.gate.pool.size=20
mail.pool.wait.millis=10000
```

- localhost <virtualip> 19

## /etc/eltex-radius/local.conf

```
# Ports on which the server will listen
auth_port=1812
acct_port=1813
inner_tunnel_port=18121

# MySQL database
db_host="localhost"
db_port=3306
db_login="radius"
db_password="radpass"
db_name="radius"

# Enable checking that SSID is locked (1 - enabled, other values - disabled)
# Check is performed using query to 'wireless' database
ssid_check_enabled=1

# MySQL 'wireless' database
wireless_db_host="localhost"
wireless_db_port=3306
wireless_db_login="javauser"
wireless_db_password="javapassword"
wireless_db_name="wireless"

# PCRF
pcrf_host="127.0.0.1"
pcrf_port=7080
pcrf_enabled=1

# EAP
ca_cert_name="default.pem"
tls_key_password="eltex"

# Proxying
proxy_auth=0
proxy_domain_regex="^(.+\\.)?enterprise\\.root$"
proxy_host="127.0.0.1"
proxy_port=18121
proxy_secret="eltex"

# Ubiquity vendor detection
ubi_vendor_regex="Apple|Ubiquiti"

# Settings of runtime NAS discovery
dynamic_clients=false
dynamic_client_subnet=192.168.0.0/16
dynamic_client_lifetime=3600
dynamic_client_rate_limit=false
```

- localhost [<virtualip>](#) 7, 18
- 127.0.0.1 [<virtualip>](#) 25

## /etc/eltex-wifi-cab/system.xml

```
<?xml version="1.0" encoding="UTF-8" standalone="no"?>
<!DOCTYPE properties SYSTEM "http://java.sun.com/dtd/properties.dtd">
<properties>
  <entry key="mongoaddress">mongodb://localhost:27017/wifi-customer-cab</entry>
  <entry key="nbiaddress">http://172.27.1.18:8080/axis2/services/RadiusNbiService?wsdl</entry>
  <entry key="nbi.serviceLogin.user">softwlc_service</entry>
  <entry key="nbi.serviceLogin.password">softwlc</entry>
  <!-- ,      eltex-auth-service -->
  <entry key="radius.auth.address">localhost</entry>
  <entry key="radius.auth.shareSecret">eltex</entry>
  <entry key="radius.auth.authPort">21812</entry>
  <entry key="radius.auth.acctPort">21813</entry>
  <entry key="radius.auth.timeout.sec">10</entry>
  <entry key="radius.auth.retries">5</entry>
</properties>
```

- localhost [<virtualip>](#) 4,5,9

## /usr/lib/eltex-ems/conf/config.txt

```
# DB Event
poolName1=event
event.jdbc.driver=org.gjt.mm.mysql.Driver
event.jdbc.dbUrl=jdbc:mysql://localhost/eltex_alert?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000
event.jdbc.username=javauser
event.jdbc.password=javapassword
event.jdbc.maxPoolSize=32
event.jdbc.inUse=yes
# remote db host access with su privileges
# event.ssh.login=
# event.ssh.password=
# event.ssh.port=

# DB Tree
poolName2=tree
tree.jdbc.driver=org.gjt.mm.mysql.Driver
tree.jdbc.dbUrl=jdbc:mysql://localhost/eltex_ems?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000&noAccessToProcedureBodies=true
tree.jdbc.username=javauser
tree.jdbc.password=javapassword
tree.jdbc.maxPoolSize=20
tree.jdbc.inUse=yes

# DB Ont
poolName3=ont
ont.jdbc.driver=org.gjt.mm.mysql.Driver
ont.jdbc.dbUrl=jdbc:mysql://localhost/eltex_ont?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000
ont.jdbc.username=javauser
ont.jdbc.password=javapassword
ont.jdbc.maxPoolSize=40
ont.jdbc.inUse=yes

# DB Syslog
poolName4=syslog
syslog.jdbc.driver=org.gjt.mm.mysql.Driver
syslog.jdbc.dbUrl=jdbc:mysql://localhost/Syslog?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000
syslog.jdbc.username=javauser
syslog.jdbc.password=javapassword
syslog.jdbc.maxPoolSize=4
syslog.jdbc.inUse=yes
```

```

# remote db host access with su privileges
# syslog.ssh.login=
# syslog.ssh.password=
# syslog.ssh.port=

# DB acsmain (alias=cpe)
poolName5=cpe
cpe.jdbc.driver=org.gjt.mm.mysql.Driver
cpe.jdbc.dbUrl=jdbc:mysql://localhost/acsmain?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000
cpe.jdbc.username=javauser
cpe.jdbc.password=javapassword
cpe.jdbc.maxPoolSize=2
cpe.jdbc.inUse=yes

# DB acscmds(alias=cmds)
poolName6=cmds
cmds.jdbc.driver=org.gjt.mm.mysql.Driver
cmds.jdbc.dbUrl=jdbc:mysql://localhost/acscmds?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000
cmds.jdbc.username=javauser
cmds.jdbc.password=javapassword
cmds.jdbc.maxPoolSize=2
cmds.jdbc.inUse=yes

# DB acsinf(alias=inf)
poolName7=inf
inf.jdbc.driver=org.gjt.mm.mysql.Driver
inf.jdbc.dbUrl=jdbc:mysql://localhost/acsinf?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000
inf.jdbc.username=javauser
inf.jdbc.password=javapassword
inf.jdbc.maxPoolSize=2
inf.jdbc.inUse=yes

# DB acscache(alias=cache)
poolName8=cache
cache.jdbc.driver=org.gjt.mm.mysql.Driver
cache.jdbc.dbUrl=jdbc:mysql://localhost/acscache?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000
cache.jdbc.username=javauser
cache.jdbc.password=javapassword
cache.jdbc.maxPoolSize=2
cache.jdbc.inUse=yes

# DB radius(alias=radius)
poolName9=radius
radius.jdbc.driver=org.gjt.mm.mysql.Driver
radius.jdbc.dbUrl=jdbc:mysql://localhost/radius?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000
radius.jdbc.username=javauser
radius.jdbc.password=javapassword
radius.jdbc.maxPoolSize=40
radius.jdbc.inUse=yes
# remote db host access with su privileges
# radius.ssh.login=
# radius.ssh.password=
# radius.ssh.port=

# ----- SSID -----
# DB wireless (alias=wireless)
poolName10=wireless
wireless.jdbc.driver=org.gjt.mm.mysql.Driver
wireless.jdbc.dbUrl=jdbc:mysql://localhost/wireless?
useUnicode=true&characterEncoding=utf8&relaxAutoCommit=true&connectTimeout=5000
wireless.jdbc.username=javauser
wireless.jdbc.password=javapassword
wireless.jdbc.maxPoolSize=30
wireless.jdbc.inUse=yes

```

- localhost <virtualip> 4, 17, 26, 35, 48, 57, 66, 75, 84, 98

#### /etc/eltex-doors/application.properties

```
spring.application.name=eltex_doors

## Mysql datasource properties
spring.datasource.url=jdbc:mysql://localhost:3306/eltex_doors?
useSSL=false&useJDBCCompliantTimezoneShift=true&useLegacyDatetimeCode=false&serverTimezone=UTC
spring.datasource.username=eltexdoors
spring.datasource.password=eltexpassword

spring.flyway.url=jdbc:mysql://localhost:3306/eltex_doors?
useSSL=false&useJDBCCompliantTimezoneShift=true&useLegacyDatetimeCode=false&serverTimezone=UTC
spring.flyway.user=eltexdoors
spring.flyway.password=eltexpassword

## Starting server port
server.port=9097

## Custom application properties
auth.cron.session.timeout=*/60 * * * * *

# Login and password from basic account
auth.username=user
auth.password=password

# Auth keys paths
auth.private.key=/etc/eltex-doors/keys/private.pem
auth.public.key=/etc/eltex-doors/keys/public.pem

# Tokens lifetime
# Use time format HH:mm:ss
auth.token.access.lifetime=00:15:00
auth.token.refresh.lifetime=720:00:00
```

- localhost <virtualip> 4,8



.. eltex-doors , , , .

## GUI

SoftWLC .

PCRF URL URL NGW- localhost ip:-



Стартовая

Статистика провайдера

Статистика SMS

Статистика Hotspot

Статистика Enterprise

Сервисы и тарифы

Пользователи Wi-Fi

Точки доступа

Журнал событий

Беспроводные сети

Операции по расписа...

Отчеты

Конструктор порталов

Hot WiFi

Настройки

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Дерево доменов

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Системные роли

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Интеграция

Таблицы

Уведомления

Уведомления клиентам B2B

Клиентские настройки

PCRF URL

http://localhost:7070

URL NGW-клиента

http://localhost:8040

URL конструктора порталов

http://172.27.1.18:8080/epadmin/

☐ Выключить проверку сертификатов

Адрес личного кабинета рекламной площадки

https://cp.hot-wifi.ru/login

- keepalived, :  
- localhost  
- localhost ip- :

Конструктор порталов  
Версия: 1.8-399 (20.10.17 15:25:22)

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Доступ к NGW

Взаимодействие с BRAS

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Доступ к PCRF


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Вход через ЕСИА

Личный кабинет

Порталы


Системные настройки

Русский  admin ▾

Заголовок страницы

Eltex WiFi Portal Administrator console

Значок (favicon)

 Изменить

Время сессии (мин)

60

Хост портала

localhost

Порт портала

8080

Сохранить

- NBI

Конструктор порталов  
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Доступ к NBI

Русский  admin ▾

Протокол

HTTP

Хост

localhost

Порт

8080


Путь к WSDL

/axis2/services/RadiusNbiService?wsdl

Имя пользователя

softwlc\_service

Пароль

..... 

Сохранить

- NGW

Конструктор порталов  
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Русский  admin ▾

Хостlocalhost

Порт8040

Сохранить

- Mercury

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Доступ к платформе Волга

Доступ к сервису опросов

Хост127.0.0.1

Порт6565

Сохранить

Конструктор порталов  
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БД платежей

Русский  admin ▾

Использовать БД платежей ☐

Хост

localhost

Имя БД


payments

Логин

javauser



Пароль

.....



Размер пула подключений

50



Период очистки

0 15 03 \* \* ?

Период очистки архива

0 15 10 L \* ?

Сохранить

- PCRF

Конструктор порталов  
Версия: 1.8-399 (20.10.17 15:25:22)

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Личный кабинет

Порталы

Доступ к PCRF



Русский  admin ▾

Хост

localhost

Порт

7070



Сохранить

## EMS-GUI

EMS localhost ( 127.0.0.1) ip- :

pcrf

Редактирование параметров модулей

GenericAp	Включен	<input checked="" type="checkbox"/>
dhcp	URL	<input type="text" value="http://localhost:7070"/>
esr	Таймаут соединения, с	<input type="text" value="11"/>
gPon	Таймаут чтения/записи, с	<input type="text" value="11"/>
gePon		
linuxServerCommon		
lte		
ltp		
ma4000		
mes		
mes3000L		
mes5448		
monitoring		
msan		
msr		
mxs		
mxl2e		
mysql		
pcrf		
plc8		
ponCommon		
portal		
radius		

Действия

Сбросить

Сбросить все

Принять Отменить

radius

Редактирование параметров модулей

GenericAp	RADIUS service name	<input type="text" value="eltex-radius"/>
dhcp	'Secret' for localhost	<input type="text" value="eltex"/>
esr	EMS host ip-address as RADIUS client	<input type="text" value="127.0.0.1"/>
gPon	Restart timeout	<input type="text" value="45"/>
gePon	Min. restart interval	<input type="text" value="60"/>
linuxServerCommon		
lte		
ltp		
ma4000		
mes		
mes3000L		
mes5448		
monitoring		
msan		
msr		
mxs		
mxl2e		
mysql		
pcrf		
plc8		
ponCommon		
portal		
radius		
sbc		
smg		
softwlc.nbi		

Действия

Сбросить

Сбросить все

Принять Отменить

softwlc.nbi



Редактирование параметров модулей

monitoring  
msan  
msr  
mxa  
mxl2e  
mysql  
pcrf  
plc8  
ponCommon  
portal  
radius  
sbc  
smg  
softwlc.nbi  
sorm2  
ssw  
system  
tau  
tftpserver  
tl1  
topgate  
uep  
voipCommon  
wep  
wirelessCommon  
wop

Действия  
↶ Сбросить  
✖ Сбросить все

IP адрес для стационарных устройств172.27.1.18

Порт (для встроенного TFTP)69

Корневой каталог службы/tftpboot

Подкаталог стационарного ПОstation\_images

Подкаталог файлов конфигурацийems

Трассировка взаимодействия☐

Включить встроенный TFTP сервер☐

✓ Принять

✖ Отменить