

RegNode

~~~~~

REGISTER NODE v1.00  
(C) COPYRIGHT 1992, The SDN Project, Ray L. Kaliss  
ALL RIGHTS RESERVED

This is the first release of RegNode, there are bound to be some problems. I will correct them as soon as possible, if you tell me about them ;)

WARRANTIES

~~~~~

No warranties of any kind. Just because I could get it to work doesn't mean I wrote it well enough so you could get it to work. Use RegNode entirely at your own risk.

LICENSE

~~~~~

SDN and IFDC (International File Distribution Cooperative) management are free to use this software for amateur, not for profit purposes. These members are free to copy it and share it as long as they do so intact, without change to the software and its documents.

DOS AND OS/2

~~~~~

An OS/2 version of RegNode is being compiled, but I could not wait for it. It shall be sent down the SDN pike.. and the next version RegNode will have it included as 'REGNODE.OS2' to be renamed to the exe.

PURPOSE

~~~~~

RegNode is an easy way of compiling a listing of participating nodes in SDN International(sm) and similar file distribution networks. Its use is not restricted to SDN systems, it may be used freely by any file distribution network member of the International File Distribution Cooperative. Other file distribution networks interested may contact me regarding possible use.

There are two major problems with keeping a member node participation list. First, the manual effort. heck.. we GOT computers! The second is nodes that drop out but don't notify the list makers to delete their entry. Nodes in the list but long since gone, are a confusion to users and are problems in topology for network managers.

What about the nodelist 'U' flags? Normal users don't read the nodelist and some entries are incorrect. File distribution network managers have no control over nodelist user flags, the nodelist is not their domain. The nodelist can represent some BBS' as being part of a particular file distribution network when in fact, they are not, and visa-versa. Sysops are mostly on the ball to put in user flags, but perhaps not as diligent at removing them. Nodelist flags may not represent the real members of a service.

Set up correctly and run in a daily batch file, the COMPILE option set with a day and combined with a monthly file attach event.. RegNode will merrily do it's thing and clean up after itself too.

Traditionally an end site would connect to a manager for files and echo.. managers used these connections to keep track. RegNode being based on automatic file attaches.. allows managers to keep track of systems that are under their management but link elsewhere.

#### THE THEORY

~~~~~

With RegNode, managers can approve members, keep track of routing, and compile official participants using automatic file attach events. Once set up, according to a tier of file attach scheduling, everything is accomplished automatically without further fuss. By using a text file as a registration, with the name of the file itself being used as a password, the manager has some control over who is approved to be included into the official listing. The list itself is kept accurate by being built new each month, nodes are not carried over monthly.

End nodes create a simple formatted text file of information on themselves, their registration, that gets file attached up to their manager during the first week of the month.

When registrations arrives at the managers system, their information is copied to a temporary storage file and the file attach is deleted. Every time RegNode is run it looks for newly arrived registrations.

That managers total listing is compiled by a set date according to his management level, the managers own registration information gets appended. A report on what registrations it did not find for the month is written. By referring to the report and the last total listing the manager can determine who the missing node feeds and take steps to reconnect orphaned nodes.

Once compiled, the managers listing is ready to be file attached up to the next manager.. who processes that list in the same way, which is sent on up for a regional listing.. which is sent on up for a national listing.. which is sent on up for an international compile of the entire listing, which is then sent to Mars for a galactic.. (oops.. too far)

SETUP

~~~~~

RegNode must be run from the directory in which it resides. If no other configuration file is named via command line parameter it looks for a default configuration file. The configuration file is pure ASCII text and can be edited. Comment lines begin with a semicolon and are ignored.

Keywords in the configuration file must be left justified.

INBOUND: The drive and path where RegNode is to look for registration update files sent in for processing. Don't end this path with a backslash, RegNode will add that. It is the inbound file directory used by your netmailer.

OUTPATH: The drive and directory where you want your compiled listing created, where your file will look for it. Do not add the backslash.

OUTFILE: The name of the file to write the compiled listing to. This name should be unique and agreed upon by you and the next manager you will be sending it to, it is used as a password and should not be easy for others to guess. Don't end this path with a backslash.

If you use RegNode for more than one network and therefor use two or more configuration files, be sure that the OUTFILE name is not the same for both.

COMPILE: This option can be used or commented out. This is give the day of the month, in digit, you want RegNode to compile on. Automatic date compile is active when this option is used. If commented out, then RegNode must be run at compile time with the '-c' parameter on the proper date.

An example would be to compile on the 7th and event your file attach after that.

@[SDN] The '@' symbol is the start of four lines of registration information. '@SDN' tells us you are registering for SDN file network and tells RegNode to copy this line and the next three lines with it as one registration.

RegNode does not do file attaching. There are a number of file attach utilities you can use to attach out your completed outfile. As example those using Squish v1.01 as a mail processor need only call..

```
'Squish SEND c:\hold\12963.sdf 141/846'
```

Whatever you use, set your event batch to call your file attach utility after RegNode has compiled. Because RegNode completely re-writes the outfile upon compile it is always the new listing that is sent.

Example configuration.

```
-----  
INBOUND: d:\net\file  
OUTFILE: ish9272.290  
OUTPATH: d:\net\hold  
@SDN  
1:102/234 Bob Royer, TIMES BBS, Nittville Nevada, 102-234-23456  
9600 baud v32 and HST. OPUS system. No subscription. 360megs of files.  
1:102/345 1:102/895 1:203/345 1:203/396
```

-----  
You can check to see if you have formatted your configuration file correctly by running RegNode -t (test mode).

## REGISTRATION

~~~~~  
Many nodes might receive the distributed file areas, but you only want the nodes who adhere to policy and are approved to appear in an official listing. The registration RegNode uses is a short ASCII text file containing only four or five lines. Although you may put up to 100 characters to a line, each line except the routing line should be kept no longer than 80 characters in order to be easily read on screen. Keep all lines left justified. The routing line can be up to 100 characters long, some systems may need all of this and more. Lines longer than 100 characters will mess up how your entry looks in the listings.

Example End Node Registration

@SDN
1:141/865 Andre Normandin, The Ultimate BBS, Meriden CT USA 203-345-5666
No subscription. SDS/SDN/UTL/GSD HSTDS 9600 v32bis, special utilities.
1:141/840 1:109/119 1:141/820 1:141/375 1:219/22

The FIRST line consists of the @ flag which tells RegNode that registration information follows, and RegNode should copy that line and the next three. Next to the @ flag put the three initial call letters of your service. If your not a manager, put nothing else here.

The SECOND line is your full 3D node address then your name, your BBS name, your city, state or providence, your countries initials and your BBS phone number. Try to fit it all in screen width of 80 characters.

The THIRD line is free form. If you could not fit everything from the first line on the first line, carry over to this line, then you might like to mention your baud, file and echo interests.. whatever you want other to know about your system.

The FOURTH line is your routing line. The first node number is the node that feeds you .. the rest are nodes you feed directly. Use full 3D node addresses for all (zone:net/node). If every node you feed can not fit into 80 characters you may use another line for a total of two routing lines, and start contemplating switching some of the load to someone else, about ten links is a reasonable limit.

Example Managers Registration

@SDN Eastern Star Manager
1:132/119 Gordon Green, Cuckoo's Nest BBS, Hudson, NH, USA 603-880-1158
Echo Coordinator, SDS Coordinator, SDN Star.
1:141/840 1:141/80 1:323:14 1:324/235 1:465/3453 1:234/3456 1:104/345
1:879/3456 8:400/345 1:102/1 1:102/45

Gordon is registering for the SDN list, he is SDN Eastern Star Manager, note he enters his managers position on the top line. Only managers should use the top line for anything else besides the @SDN flag. Notice Gordon feeds quite a few of nodes and has to use two routing lines, any more lines will be ignored.

The fourth line, the routing line is very useful for network management. If, for some reason, Gordon stops being a part of SDN, and his feed manager (from whence he gets his SDN areas) who we can tell is 1:141/840 does not get Andre's monthly update.. information is available. The nodes he feed downstream (now orphaned) can refer to last months list and contact Gordon's feed node to re-established links.. Gordon's manager can know who was orphaned and have a list of possible replacements.

LISTING ACCEPTED NODES

~~~~~

Create an ASCII text file named REGNODE.LST or edit the sample one and put it into the same directory as RegNode. This text file will contain the unique file names you and the node you will accept registrations from have agreed upon. It should also contain a bit of personal information on each node. RegNode will only look for and process the file names that appear in this listing. As a manager of the file distribution network you can approve nodes you feel have complied with network policy, while barring others from being added to the official listing.

Here are some example lines for REGNODE.LST

```
-----  
1qazwsx.reg   Jim Dither, The Blast BBS System, Silver City 102/222  
297yet.reg    Tom Thumb, The Layer, Arlington, 102/234  
MANAGERS  
bingo12.222   Bill Downing, SDN Net Manager in Jefferson, 405/3456  
-----
```

File names must be left justified, followed by a space and then whatever you want for one line information on who that file belongs to. Keep it all to one text line about 80 characters total. Nodes listed before the MANAGERS verb will be processed for only one registration, nodes listed after the MANAGERS verb are assumed to be managers who will be sending a listing with one or more registrations to process. If you are a net manager and are not receiving compiled lists then comment MANAGERS out and all received files will be treated as single registrations.

#### END NODE REGISTRATIONS

~~~~~

End node do not need RegNode.. they have no nodes sending them registrations, but to be in the compiled listing they have to send you their registration monthly. They agree with you on a unique file name, then edit in their information as shown above, and file attach it to you during the first week of the month.

OPERATIONS

~~~~~

There are three parameters you can pass to RegNode to change it's

operations.

TEST [-t]

regnode -t

TEST can be used to be certain you have formatted your configuration file correctly. I suggest you run this test mode first to see if all paths are right. Nothing is done in this mode except read the config file.

COMPILE [-c]

regnode -c

COMPILE tells RegNode that you want to force a compile. When used, RegNode will look for any other registration attaches not yet processed, process and delete them, process your own registration, and write a report of missing registrations named REGNODE.RPT. Your outfile is now ready for file attaching upstream.

FILENAME

regnode [filename]

If you want RegNode to use a different configuration file you can specify it's name on command line. Any parameter without a leading '-' is considered the name of a configuration file for RegNode to use instead of it's own default. DO NOT enter an extension.

regnode -t sds

Calling RegNode as above, it will test it's reading of 'sds.cfg' as a configuration file.

regnode -c dvnnet

Calling RegNode this way forces it to compile using 'dvnnet.cfg' as a configuration file.

regnode lannet

Calling RegNode in this way makes it do it's thing based on the configuration file 'lannet.cfg'.

COMPILATION DATES

~~~~~

Naturally, to get the RegNode concept to work, different level managers must compile on different dates. All end nodes should file attach their registrations by the 7th of each month. All Net level managers should compile and attach on the 8th day of each month, all Regional level managers should compile and attach on the 16th, all Star systems compile on the 24th and the new total listing should be compiled on the 1st of

each month and published.

Manager Level	Date of Month for Compile and Attach
(End Nodes)	(File attach in before the 7th)
Net Managers	Compile and Attach in on the 8th
Regional Managers	Compile and Attach in on the 16th
Star Managers	Compile and Attach in on the 24th
Published	On the 1st of new month

REGNODE.REG

~~~~~

In order for RegNode not to step on itself and allow time for your compiled file attach to be sent, the actual outfile listing of registrations is not written until RegNode compiles. Between compiles the registrations are stored in REGNODE.REG in the default directory. Upon compile, if the outfile does not yet exist, it is created, if it does exist it is assumed to be last months copy and it is truncated and re-written with this months registrations. REGNODE.REG is deleted and the whole process is ready for the new month. If you use another configuration file this storage file will take the name of your configuration file but retain the .reg extension.

(See: RegNode File Names)

#### LIMITATION

~~~~~

RegNode will inform the manager only if any nodes listed in his own REGNODE.LST are missing. With the case of a lower manager sending you a listing that consists of a few nodes, RegNode will not tell you if any nodes are missing from or added to that lower managers list.

MULTI-REGISTRATION

~~~~~

RegNode can be used to create multiple listings, how this is dealt with at the top depends on the software used at the top for the final sort and processing. Consult with your manager if you feel you need more than one listing.

#### REGNODE FILE NAMES

~~~~~

RegNode can be used to append and compile registration for different file distribution networks. When you do not pass RegNode a new configuration file name to use, it uses all it's file names as "regnode.xxx" by default.

If you pass RegNode a command line parameter other than -t or -c then it takes it for granted you have passed it another configuration file to use and it uses the new file name you have passed it for all it's work. In this way one manager can make Regnode do double duty for two or more file

networks. If you do use two configuration files be sure not to use the same OUTFILE name for both.

Default Names: REGNODE.CFG (configuration information)
*REGNODE.TMP (temporary registration info storage)
REGNODE.RPT (report missing nodes after compilation)
REGNODE.LST (listing of accepted registration files)
*REGNODE.REG (a listing of nodes found so to date)

* Designates files which are used, then deleted on compile.

If you call Regnode like this:

```
regnode sdsnet
```

The New Names: SDSNET.CFG (configuration information)
SDSNET.TMP (temporary registration info storage)
SDSNET.RPT (report after compilation)
SDSNET.LST (listing of accepted registration files)
SDSNET.REG (a listing of nodes found so to date)

You can combine the switches -t and -c with while passing another configuration file name, or not.

ERRORLEVEL & BATCH ~~~~~

RegNode is designed to be run once a day in batch or command line. Because of the COMPILE day option, you should NOT run it after every mail event or more than once a day. If you do, on the second run it will find all registrations missing! it will have already cleared out all information getting ready for next month. If you do NOT set the COMPILE day and comment that feature out, then you can run RegNode in batch after every mail event, you will either have to event a compile ONCE on compile day or run the -c parameter manually.

When RegNode ends, it will end by passing DOS one of three errorlevels. These can be useful when running in batch file.

- (1) If something goes wrong (could not find configuration)
- (2) If everything ran OK
- (3) If RegNode created a report of missing nodes

An example of batch file to run RegNode in for a daily event. It is assumed you have set your compile date in the configuration. If run on any day except the compile day.. either all runs OK (exit 2) or RegNode had problems (exit 1) and things are halted. On the compile date, if a report is written it is copied to a \HOLD directory when the sysop will see if later.

```
ECHO OFF  
REGNODE
```

```
IF ERRORLEVEL 3 GOTO MISSING  
IF ERRORLEVEL 2 GOTO END
```

```
ECHO RegNode had a system configuration error!!!
```


PAUSE

:MISSING
COPY *.RPT C:\HOLD
:END

LAST WORDS

~~~~~

At this release RegNode is for the use of IFDC sysops only. Other file distribution networks that may wish to use RegNode or some modification of it are welcome to drop me netmail. Future revisions are contemplated.

My thanks to Tom Hendricks, SDS Coordinator, who assisted with developing the idea of RegNode.

Gordon Green, who's information appears in one of the example registrations, hopes to release Reg-Tree by June 1st, 1992. Reg-Tree in beta gathers routing information and presents a linkage tree from it. Very useful!

Comments of a constructive nature are welcome.

\*ray kaliss  
SDN Project Manager  
1:141/840@fidonet

→