Link Admin Utility Manual

This document list instructions to change settings for various Link features using Link Admin Utility program

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Setup SMTP server for data emailing

Correct SMTP server setup is required for data emailing.

- 1. Start "Link Client"
- 2. Click Help -> Admin Utility to start Link Admin Utility

👛 Alarm Notifica	tion	
Connect View	Help	
Dashboard		Configuration Folder
		General Settings
🗑 Alarm Stati		Admin Utility
Reports	,	About
		Offline:

3. Click on "Email Settings" tab.

ink Admin Utility.
Alarms
Email Settings
Reporting Service
Backup
Services
Maintenance

4. Enter Server address under **Host** and enter **Port number** Click Use **TLS/SSL** button only if SMTP server uses **SSL** otherwise leave it unchecked

Server	
Server	
Host	Port
	25 🕒 Use TLS/SSL

Notice: Link version 4.0.1 only supports SSLv3, and does not support TLS. Most email hosting operations, such as those provided by Google, Microsoft, or Amazon, require TLS support. These providers are not currently supported by Link.

5. If SMTP server requires authentication, click "User Authentication" option and enter in **Username** and **Password**. Otherwise, select "No Authentication" option

Authentication		
○ No Authentication		
User Authentication		
Username	Password	
EditEmailUsername		

6. Edit Retry period, Email Address and Sender Description if required. Then Click Save button

Retries 0 💽 Minutes	Emails that fail to send will be tried again after this time interval.			
Sender				
Email Address	Sender Description			
link@donotreply.com	Link Battery Monitoring Software			
Test Connection	Click the button to test the above email configuration			
	Save Close			

7. After these changes all services will restart automatically. System should have SMTP server setting for data emailing now

Correct SMTP server setting can be checked with following procedures:

- 1. Click on "Test Connection" button
- 2. Enter Email Address to receive test email and click "OK" button

Link Admin Utility	\times
Enter the test email address	
OK Cancel	

3. If correct SMTP settings are made, Admin Utility will display "Test Successful" message and test email will be received in Email address entered in step 2. If there is error in setting, Admin Utility will display error message

Test	
Test Connection	✓ Test Successful
Test	
Test Connection	Test Failed 10060:Connection timed out

Enable Data Export

Export feature is disabled for default install. Follow below procedures to enable export.

Note: Ensure correct SMTP server setting is set before enabling data export

- 1. Click on "Reporting Service" tab in Link Admin Utility.
- Select Powershield button to send data emails to <u>data@powershield.co.nz</u> or select Other button and enter in email address to receive data export emails. Selecting both options will send data emails to both email address
 - Note: multiple email address can be listed separated by comma
- 3. Edit file size per email if needed

	~
Remote Reporting Service	
The Remote Reporting Service requires a separate subscription with PowerShield Limited or an authorised PowerShield partner. For more information visit	
http://powershield.com	
Exports	
Service	
Powershield	
Other	
File size per email	
Size of files per email (kb)	
2000	
	Remote Reporting Service requires a separate subscription with PowerShield Limited or an authorised PowerShield partner. For more information visit http://powershield.com Exports Service Powershield Other File size per email Size of files per email (kb) 2000

4. Enter Organization details then click "Save" button

Company Name	Facility Name	
Company Name	Facility Name	
City	Country Code	
City Name	US	

After these changes all services will restart automatically. System should have export feature enabled after service reset.

Disable Data Export

1. Click on "Reporting Service" tab in Link Admin Utility. Ensure both tick boxes under **Exports/Service** tab are **unchecked** then click "Save" button

Link Admin Utility				×
Alarms	Remote Reporting Service			
Email Settings Reporting Service Backup Services Maintenance	The Remote Reporting Service of Limited or an authorised Power http://powershield.com Exports Service Powershield Other File size per email Size of files per email (kb) 2000	requires a s Shield partr	eparate subscription wi ler. For more informati	th PowerShield on visit
	Organization Company Name Company Name City City Name	Facili Facil Couni US	ty Name ity Name try Code	
		[Save	Close

After these changes all services will restart automatically. System should have export feature disabled after service reset.

Enable Email Alarm Notification

Email Alarm Notification feature is disabled for default install. Follow below procedures to enable this feature

Note: Ensure correct SMTP server setting is set before enabling Email Alarm Notification

- 1. Click on "Alarms" tab in Link Admin Utility
- 2. Select Enable email notifications option
- Edit Time Window and Email Limit if needed
 Note: Alarm emails will be only sent during Time Window set
- 4. Click "Save" button. After these changes all services will restart automatically.

Link Admin Utility						×
Alarms Email Settings Reporting Service Backup Services Maintenance	Emailing Notifical Emailing Time W © 24 © 24 © 24 © 24 © 24 © 24 © 24 © 24	Battery Alarms ons ble email notifica ndow Vindow Hours (emails ca ecified hours art Time 1:00:00 AM Limit aximum number w. Emails past th indow.	an be sent a	any time) End Time 11:59:59 F In individua collected a	PM ᢏ	the time of the next
					Save	Close

5. Open Link Client

Alarm Notification						- 🗆	×
Connect View Help							
📾 Dashboard	🖶 Add	🗱 Delete	📄 Edit	🔄 Cancel	R Save	🔑 Change Password	
强 Alarm Status	Users		Settings				
Reports	Username						
Real-Time -	GUEST		User na	ime	ADMIN		
Summary	USER		Email A	ddraee			
📟 Detail			LinairA	luuress			
Graph By -			Work P	hone			
🜌 Event			SMS N	umber			
🚰 Trend			000	uniber			
👔 Day			Other				
Data Transfer 👻			Access		Admin	~	
🛓 Downloads 🛛 🔳 🚺							
Communications			Send E	mail			
Settings -			Send S	MS			
🥵 Users	K						
👰 Systems							
Battery Types							
🔑 Security							
Alarm Notification							
4 0 1 17							

6. Select **Users** tab. Select one user (which is in use) and click **Edit** button

7. Enter **Email Address**, click "Send Email" option then click "Save" button

🖉 Edit	納 Cancel	🔚 Save	🔎 Change Password
Settings			
User nar	me	ADMIN	
Email A	ddress		
Work Pł	ione		
SMS Nu	mber		
Other			
Access		Admin	~
Send Er	nail		
Send SM	MS		

8. Alarm notification email will be sent to email address entered in step 7, if alarms are raised

Alarm notification setting can be checked with following procedures:

1. Click on "Test" button

Test		
Test	Click the button to test the above email configuration	

2. Enter Email Address to receive test email and click "OK" button

Link Admin Utility	\times
Enter the test email address	
OK Cancel	

3. If correct alarm notification settings are made, Admin Utility will display "Test Successful" message **and** test email will be received in Email address entered in step 2. If there is error in setting, Admin Utility will display error message

Test	✓ Email Sent Successfully
Test	
Test	Test Failed 10060:Connection timed out

Enable SMS Alarm Notification

1. Configure the "Email to SMS" gateway in the Link Admin Utility.

Link uses an Email to SMS gateway service to send SMS messages. Link sends a standard email to this service. The service then converts that email to an SMS and sends it to the SMS number. If no internal gateway service is available at the customer premises a third party service will be required.

Link Admin Utility	×					
Alarms	Email to SMS Gateway					
Alarms Email Settings Email to SMS Reporting Service Backup Services Maintenance	Email to SMS Gateway Parameters To specify where to insert the number into the email address or subject use: sms-number To specify where to insert the alarm message into the email message body use: sms-message Email Format Address Format sms-number@example.org Subject Format					
	Link Alarm Email Message Body sms-message					
	Test Click the button to test sending an SMS Please refer to the PowerShield Link Admin Utility Instructions for support					
✓ Last configuration	aved at 22/01/2020 2:50:24 PM Save Close					

These fields need to be configured to match the format of the email as required by the selected SMS gateway service. These requirements will be different between SMS gateway services.

a. Address Format:

This represents the email address where the alarms are sent. When sending a notification email Link will replace the word "sms-number" with the actual SMS numbers for each Link user who has entered an "SMS Number" and enabled the "Send SMS" checkbox.

b. Subject Format:

This is the subject of the email. The word "sms-number" can also be used in this field.

c. Email Message Body:

This represents the contents of the email. When sending a Notification email Link will replace the word "sms-message" with the details of the Link alarm. The word "sms-number" can also be used in this field.

Do not enter SMS numbers directly in to these fields.

2. Specify the SMS number to send notification messages to

- 1. Open Link Client.
- 2. Select the **Users** tab.
- 3. Select a valid Link "Username" from the "Users" List or click the "Add" button to add a new one.
- 4. Enter the SMS number into the "SMS Number" field.
- 5. Tick the "Send SMS" check box.

Link - Battery Management						-		×
Dashboard	- Add	🗱 Delete	🖉 Edit	🥎 Cancel	ave 🔚	🔑 Chang	e Passw	ord
🚱 Alarm Status	Users		Settings					
Reports	Username							_
Real-Time -	GUEST		User na	me	ADMIN			
Summary	USER		Email A	ddrees				
📟 Detail			Emany	auress.				
Graph By 👻			Work Pl	hone				
M Event			SMS N	SMS Number				
🚰 Trend			0.00 10		1			
👔 Day			Other					
Data Transfer 🝷			A		Adaria			
🛓 Downloads			Access		Admin	~		
Communications			Send Er	mail				
Settings -			0.10		_			
🥵 Users			Send Si	WS				
連 Systems								
Battery Types								
🔑 Security								
Alarm Notification								

Disable Email Alarm Notification

- 1. Click on Alarms tab in Link Admin Utility
- 2. Untick Enable email notifications option
- 3. Click "Save" button. After these changes all services will restart automatically.

Link Admin Utility			×
Alarms	Emailing	Battery Alarms	
Email Settings Reporting Service Backup	–Notificat □Ena	ions able email notifications	

4. No email will be sent after alarm is raised once email alarm notification feature is disabled

Edit Battery Alarms Setting

Notice: The settings on this page only affect Sentinels/B2000s. Controllers contain their own clearing logic and are unaffected by these settings.

- 1. Click on "Alarms" tab in Link Admin Utility
- 2. Select Battery Alarms tab

Daily ReWeekly

Link Admin Utility	
Alarms	Emailing Battery Alarms
Email Settings Reporting Service	Auto Clearing
Backup	Schedule:
Services Maintenance	battery alarms from the monitor.

3. Auto Clearing Schedule maybe edited with Hourly, Daily, Weekly options

Auto Clearing
Auto cleaning
Schedule: This is the schedule that Link uses to clear battery alarms from the monitor.
Schedule:
Hourly ~
Hourty

4. Time window for alarm reactivation maybe edited to reactivate alarm at faster or slower rate

Reactivation		
Time Window:		
If the same fault condition reoccurs within this time window, the alarm is reactivated in link		
24 Hours		
Impedance Time Window:		
reoccurs within this time window, the alarm is reactivated in Link.		
48 Hours		
	Save	Close

5. Click Save button to save changed settings. New settings will be applied after automatic service restart

Database Backup

- 1. Click on "Backup" tab in Link Admin Utility
- Click on "Backup" button.
 Note: Ensure Link.fdb database is located in C:\Program Files (x86)\PowerShield\Link Server\Database directory

	,,						
Link Admin Utility							×
Alarms	Backup	Restore					
Email Settings	Backup History						
Reporting Service	Duckup motory						
Backup	Name		Strin	Monoblo	First Discharge	Last Discharge	First Memo
Services							
Maintenance							

3. Once backup is completed, backup file will appear in **Backup History** screen

ink Admin Utility							>
Alarms	Backup	Restor	e				
Email Settings Reporting Service	Backup History						
Backup	Name		Strin	Monoblo	First Discharge	Last Discharge	First Mem
Services Maintenance	Link_26-03-20	J18_1.fbk	3	120	-	-	-

Database Restore

- 1. Go to "Services" tab then **stop** all services (Detailed instruction on **stopping services** is listed in page 10)
- Rename Link.fdb to link test.fdb.
 Ensure Link.fdb database is not located in C:\Program Files (x86)\PowerShield\Link Server\Database directory
- 3. Click on "Backup" tab in Link Admin Utility
- 4. Select backup file then click "Restore" button. **Note:** Restore button is disabled if backup file is not selected

Link Admin Utility							×
Alarms	Backup	Restore					
Email Settings Reporting Service	Backup History						
Backup	Name		Strin	Monoblo	First Discharge	Last Discharge	First Memo
Services Maintenance	Link_26-03-20	18_1.fbk	3	120	-	-	-

- 5. Once restore is completed, start all services then start Link
- 6. Link should be running with restored database

Start/Stop Services

1. Click on "Services" tab in Link Admin Utility

Link Admin Utility			>
Alarms	Start All	Stop All	
Email Settings	Service Name	L	State
Reporting Service	LinkGuardianS	ervice	Stopped
Backup	PsMonitorServe	er	Stopped
Maintenance	PsReportServe	r	Stopped
	PsImporter		Stopped
	PsExporter		Stopped
	PsEmailDispat	cher	Stopped

When services are in Stopped state, click "Start All" button.
 State of service will be changed to Starting... then to Running state
 Note: Services are properly running once they are in Running state

Link Admin Utility			×	
Alarms	Start All	Stop All		
Email Settings	Service Name		State	
Reporting Service	LinkGuardianSe	rvice	Running	
Backup Services	PsMonitorServer	r	Running	
Maintenance	PsReportServer		Running	
	PsImporter		Running	
	PsExporter		Starting	
	PsEmailDispatc	her	Starting	Ī

When services are in Running state, click "Stop All" button.
 State of service will be changed to Stopping... then to Stopped state
 Note: Services are fully stopped once they are in Stopped state

Link Admin Utility				×
Alarms	Start All	Stop All		
Email Settings	Service Name		State	
Reporting Service	LinkGuardianSe	ervice	Stopped	
Backup	PsMonitorServe	er	Stopping	
Services	PsReportServer	r	Stopped	
Wantenance	Pelmoorter		Stopped	
	DeFreeder		Otopped	
	PSExporter		Stopped	
	PsEmailDispate	cher	Stopping	

Change Link to Service Edition

- 1. Click on "Configuration" tab
- 2. In the Edition box select the "Service" option

ink Admin Utility	
Alarms Email Settings Email to SMS Reporting Service Backup Services	Link Database Repair Database Tables Edition Standard Service
Configuration	User Mode Simple Legacy

- 3. Click "Save" button. Changes will be applied once all service restarts
- Open Link Client. Go to Help-> About. Link Edition should be displayed as Service
 Link

A	bout Link	
	Link Software PowerShield Battery Managemen Link Edition:	it Systems Service

Change Link to Standard Edition

- 1. Click on "Maintenance" tab in Link Admin Utility
- 2. On the Link tab, in the Edition box select the "Standard" option
- 3. Click "Save" button. Changes will be applied once all service restarts
- 4. Open Link Client. Go to Help-> About. Link Edition should be displayed as Standard

Change Link User Mode

By default, Link is installed in Simple User Mode which means the Link Client automatically connects to the Link Server without the user needing to enter a username or password. If the facility/site requires basic security with Link, then enable Legacy User Mode.

Location of the User Mode setting is shown below.

Link Admin Utility				×
Alarms Email Settings Email to SMS Reporting Service Backup Services	Link Editio	Database Repair on Standard Service	Database Tables	
Configuration	User	Mode Simple Legacy		

Change User Mode:

- 1. Close all Link Clients
- 2. Click on "Configuration" tab in Link Admin Utility
- 3. Select User Mode
- 4. Click on "Save"

Save System Summary

The System Summary file contains information about the computer and the Link configuration, the file is for Tech Support purposes only and maybe requested by a PowerShield partner or PowerShield.

- 1. Click on "Configuration" tab in Link Admin Utility
- 2. Click "Save Summary File" button

Link Admin Utility			×
Alarms Email Settings Email to SMS Reporting Service Backup Services	Link D Edition Star	latabase Repair ndard vice	Database Tables
Comgulation	● Sim ○ Leg ⊂Client C	ple acy onnection al host only	
	System	Summary Save Sum Email Sun	nmary File

3. Choose **directory** to save summary file and enter in **filename** then click "Save" button **.pws** file will be generated in selected directory



Note: Saving may take several minutes if database size is large

Email System Summary

1. Go to Link Server Directory (*C*:*Program Files (x86)**PowerShield**Link Server*) and open LinkAdminUtility.ini

^	Name	Date modified	Туре	Size
:SS	🔟 libeays2.dli	11/02/2013 10:30	Application extens	1, ГЭТ КВ
*	libssl32.dll	11/02/2013 10:35	Application extens	264 KB
ds 🖈	📑 LinkAdminUtility	15/09/2017 4:09 PM	Application	1,728 KB
ste at	LinkAdminUtility	20/02/2018 3:32 PM	Configuration sett	3 KB
	LinkUtils	15/09/2017 4:13 PM	Application	7,279 KB

2. Enter Email address to receive system summary file under Maintenance tab e.g. <u>Email=someone@gmail.com</u>

```
[Maintenance]
Path=C:\Program Files (x86)\PowerShield\Link Server\Maintenance
DumpTables=1,27,28,12,13,14,15,16,29,55,77,74,75,78
Logs=C:\Program Files (x86)\PowerShield\Link Server\LOG
Email=email service
Gfix=C:\Program Files\Firebird\Firebird_2_5\gfix.exe
```

- 3. Open LinkAdminUtility.exe file and click "Configuration" tab
- 4. Click "Email Summary File" button

Link Admin Utility		×
Alarms	Link Database Repair Database Tables	
Email Settings Email to SMS Reporting Service Backup Services	Edition Standard Service	
Configuration	User Mode	
	● Simple ○ Legacy	
	Client Connection	
	System Summary Save Summary File	
	Email Summary File	

5. Email should be sent to email address listed in Step 2

Database Repair

- 1. Click "Database Repair" tab in "Maintenance" Screen
- 2. Click "Run" button
- 3. If there are any errors in database, it will be fixed

Link Admin Utility							×
Alarms	Link	Database I	Repair Databas	e Tables			
Email Settings Reporting Service Backup	□ Vali ☑ Vali	idateDB idateFull	☐ SweepDB ☑ MendDB	□ Listl □ Che	LimboTrans ckDB	☑ IgnoreCheck	sum Run
Services Maintenance	Runnin Finishe	g ed					
					Sa	Ve	Close

Database Tables

- 1. Click "Database Tables" tab in "Maintenance" Screen
- 2. Table Counts displays number of entries in database table

Link Admin Utility				×
Alarms	Link Database Re	epair Database Tables		
Email Settings	Table Counts			
Reporting Service				
Backup	3 Reports 0 Imports 0 Exports 0 Comm Stats 0 Downloads			Clear
Services Maintenance				Clear
			Clear	
			Clear	
			Clear	
	0 Import Histo	ries		Clear
	Recount			
	Config Updating Fla	g		
			Save	Close

3. Click "Clear" button to remove certain types of entries in database table



Clear

4. Click "Recount" button to reload entry counts in database table

0 Import Hist	tories	Clear
Recount	1	

5. Click "Clear" button to clear "Config Updating Flag"



Link Remote Client Setup

For installations that require Link Clients on other computer(s), the Link Server must be enabled to allow client connections other than local only. This scenario also requires the user mode to be "Legacy" as the Link Client(s) need to be configured to connect with the Link Server.

- 1. Close all Link Clients
- 2. Go to the 'Configuration" tabs

Link Admin Utility				
Alarms Email Settings Email to SMS Reporting Service Backup Services	Link Edition © S	Database Repair n tandard ervice	Database Tables	
Configuration	User Mode Simple Legacy Client Connection Local host only			

- 3. Set User Mode to "Legacy"
- 4. Untick "Local host only" under "Client Connection"
- 5. Click "Save", changes will be actioned once all services have restarted
- 6. Modify Windows Firewall to allow incoming connections on TCP port 14000 (see Microsoft Windows Firewall documentation)

To setup a computer to use Link Client only, run the Link Setup and select Link Client only installation. By default Link Client is configured to connect to localhost and the following steps outline how to configure Link Client to connect to Link Server on a different computer.

Configuring a remote Link Client

1. Run Link Client and it will fail to connect, see below

🛎 Link - Battery Management	
Connect Help	
	Link Login X
	Login
	Cannot connect to the Link server: Error connecting with SSL.
	Login Details
	Username:
	GLOBAL
	Password

	☑ Keep me logged in
	Show Advanced Options
	Login Cancel
	Login Cancel

Change the "Username" to *admin* and the "Password" to *ADMIN*.
 Then Click on "Show Advanced Options" and click "Edit", then set the "Host" IP address. This is the IP address of the computer/server running the Link Server software

ink Login		×
Login		
Login Details		
Username:		
admin		
Password:		

⊠ Keep me logged in		
Advanced Options		
Profile Name:		
Linkolient		
Host:	Fort:	Encrypted:
	4000	Enabled V
	Cancel	Save
	Hi	de Advanced Options
	Login	Cancel

3. Click "Save" and "Login"