

2T Technology

Technical Support Note

Using Your Mobile Phone for Network Signal Strength Investigation.

Motivation

Working in tech support we regularly get installers telling us that they have excellent signal on their mobile phone, although the GSM device may be struggling to get a decent signal to operate with.

For example; the Installer's phone may be on 4G Vodafone and the GSM device may be a 2G only or a 2G/3G device. So what matters, in this example, is what is the 2G or 3G signal, in the area that the GSM device is installed.

Purpose

- This method can be used to do a site signal level survey before installing a GSM system.
- This method can also be used to diagnose signal level problems when determining issues with GSM operation.
- This method can also be used to resolve signal level problems by identifying what band has good signal levels at the site where the GSM is installed and switching the GSM unit to operate on that band.

Introduction

This document outlines the use of an App available for Android mobile phones, which allows GSM signal level measurements, when on site at the location of the GSM device. This App, along with changing the Settings on your mobile phone, will give you a graphical indication of signal levels at the location for all bands that your phone will operate on eg: 4G, 3G, 2G.

If your phone is on one Network, say Vodafone, but you need signal level measurements for the "3" network. Then you need a 3 mobile phone with a 3 SIM or an unlocked mobile phone with a 3 SIM.

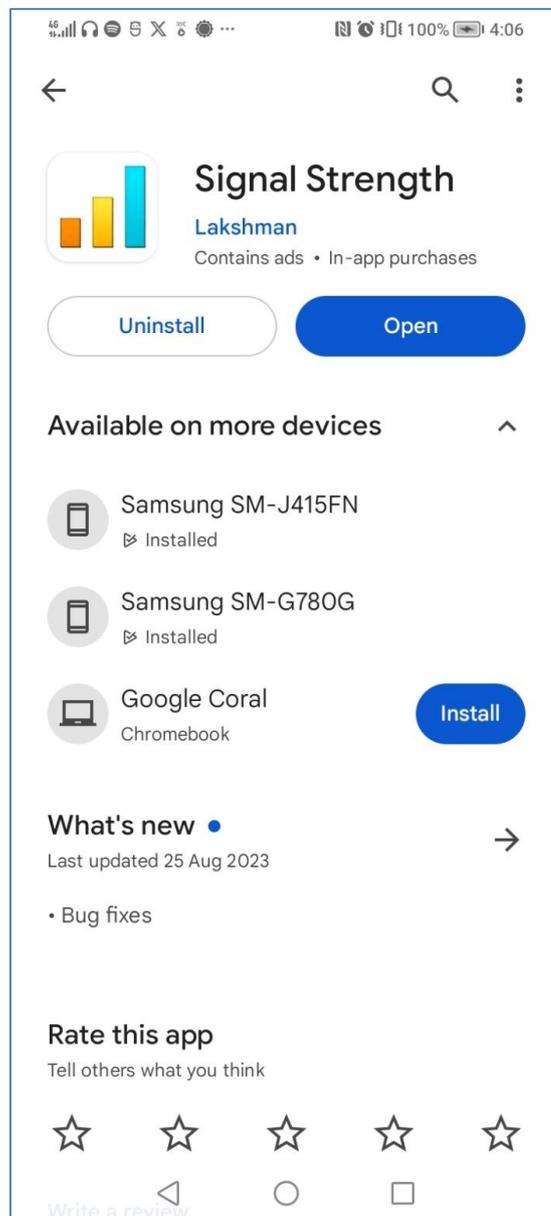
App to install on your phone

Link in Google play Store for Signal Strength App. This is for the Android phone. We haven't identified one for iPhone yet (if you have one let us know)

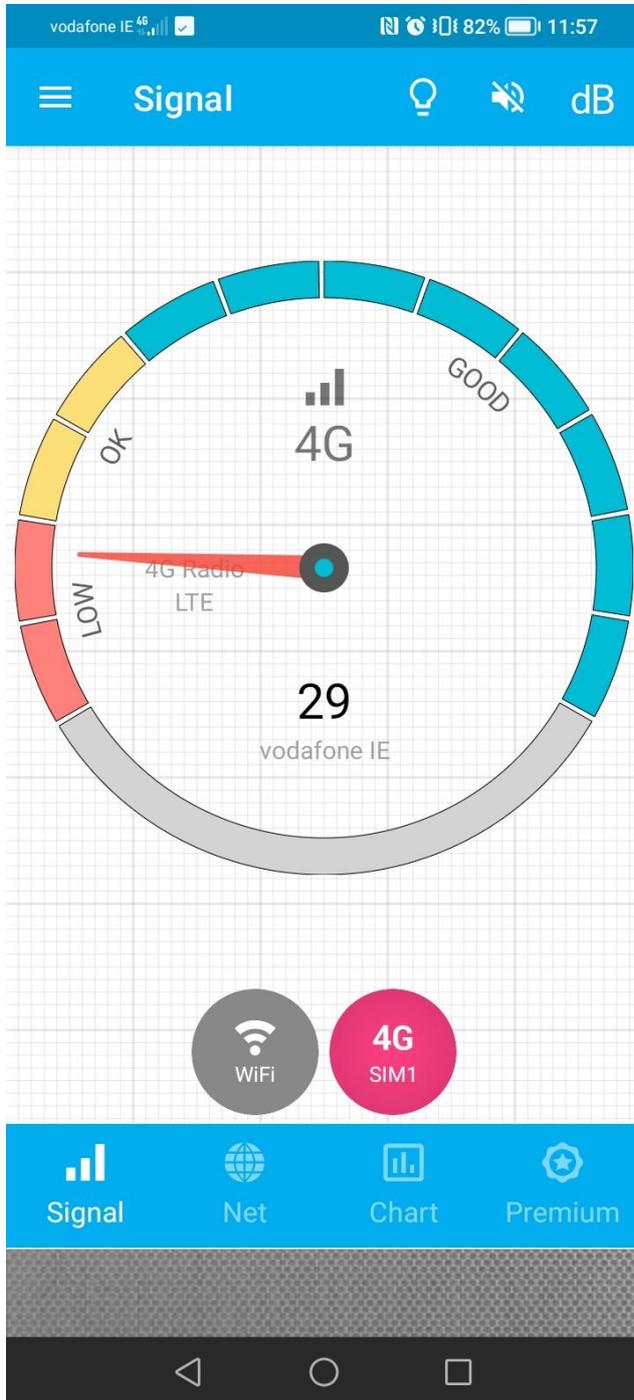
<https://play.google.com/store/apps/details?id=com.cls.networkwidget>

On google play store search for Signal Strength by Lakshman

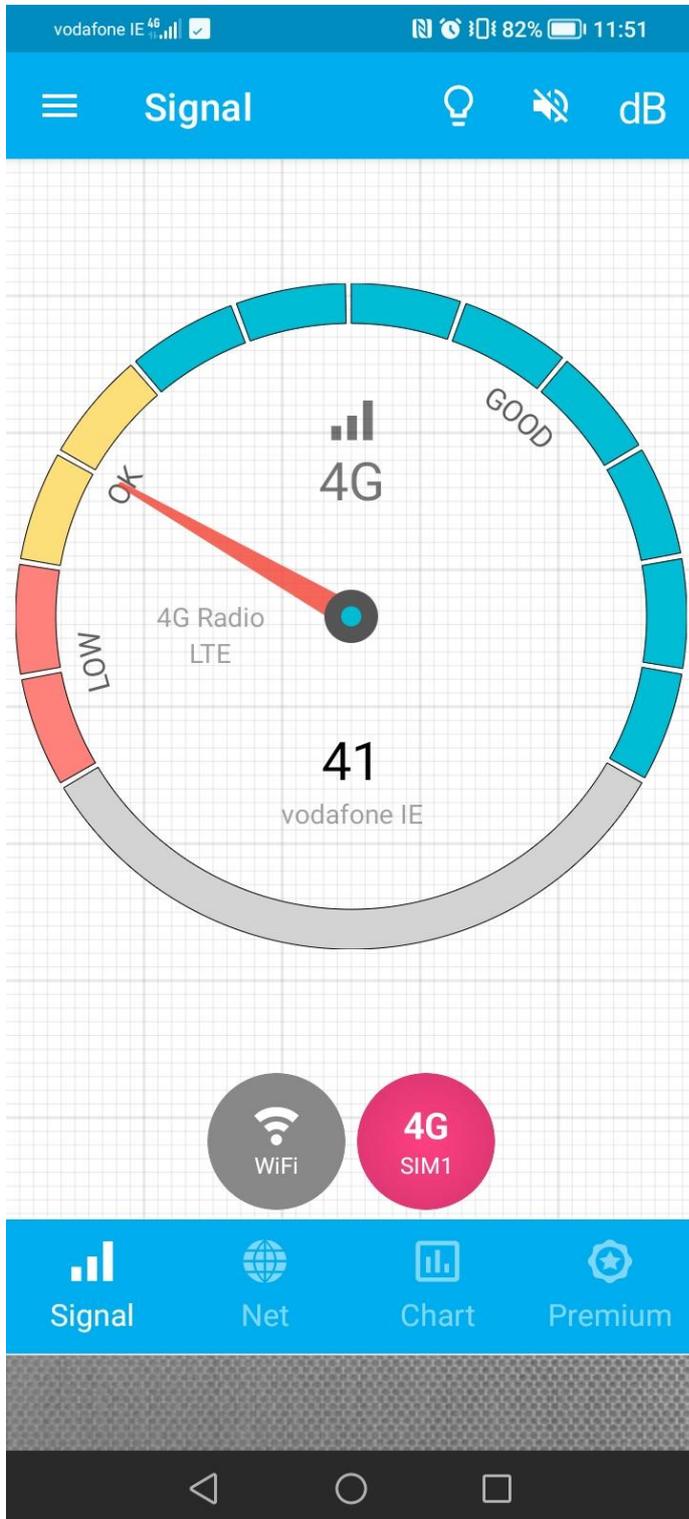
Please Note: This App gives the Signal level for your SIM and phone. So to get Signal Levels for different networks you need more phones or one unlocked phone with a few SIMs.



With a Vodafone SIM in a Vodafone Phone on a customer site I got. This is a worrying level for 4G signal. Better to switch to 3G



With a Vodafone SIM in a vodafone Phone on a customer site I got. This is an ok level for 4G signal. And this is ok if it isnt varying with time.



Using the Signal Strength App by Lakshman will give the performance for that phone on that network. To control the band 4G,3G, 2G to get the Signal Strength on that band set the phone to operate on that band using the Settings App on your phone. Follow the steps shown below.

