Writing Sample

Cover sheet

1. How much of the content did you write?

I wrote all of it and created the diagram.

2. Does the document represent your original writing, or is it existing content that you revised?

This sample represents my original writing. It's available online as well: https://sigmastcomms.com/what-is-rcs/.

3. Where did you get the information to write the document?

The information was sourced from my knowledge and that of our executive team.

4. Was the document edited by other people for grammar and style? Choose one: ▸ No ▸ Light editing ▸ Moderate editing ▸ Heavy editing ▸ Other (explain). If so, who edited the document?

There was light editing by our executive team for accuracy and tone.

5. Share how you obtained any code samples.

N/A

6. Was a company style guide used to write this document?

Yes. The style guide is based on the Microsoft Manual of Style with some customizations.

7. Provide any additional useful context for the sample, such as deadlines, achievements, etc.

This was requested for the company website. The purpose is to provide a quick conceptual overview of what RCS (Rich Communication Services) is and how it can impact users. It's aimed at both technical and general audiences who are not familiar with RCS.

8. Was this document part of a larger documentation set?

No.

What is RCS?

While SMS/MMS popularized text messaging and continues to be a reliable means of communication, it has not evolved much since its wide adoption in the early 1990s. Even when smartphones were introduced, SMS functionality was left largely unchanged with 160-character limits and simplified messaging features. With its limitations clearer now than ever, RCS picks up where SMS leaves off.

The next generation of messaging

Rich Communication Services (RCS) is the evolution of text messaging beyond SMS. Most new carrier-based messaging services are built on RCS because is delivers a consistent and multi-featured messaging service.

A text messaging standard

RCS isn't another messaging app, it's a technical standard—a kind of blueprint for organizations to follow. The GSM Association (GSMA), a trade body that represents carriers, has been developing this standard in collaboration with the mobile industry. From the outset, the main goal was to design a replacement for SMS with the same wide-interoperability between wireless networks, but with more user features.

This technical standard has gone through several iterations, but what is being developed and deployed today is called the "Universal Profile" specification. This defines the advanced messaging features of RCS, as well as how service providers, mobile network operations, device manufacturers, and app developers can support it.

The first version of Universal Profile was released in 2016, which was followed the next year by Universal Profile 2.0. This more recent version of the specification includes standards for implementing everything from chatbots to expanded functionality using plugins.

Modern messaging features

RCS includes the modern and forward-looking features that SMS can't. These features include, but are not limited to:

- Group chats
- File transfers

- Messages status notifications
- Typing indicators
- Long messages
- Audio messaging
- Location sharing
- Live sketching

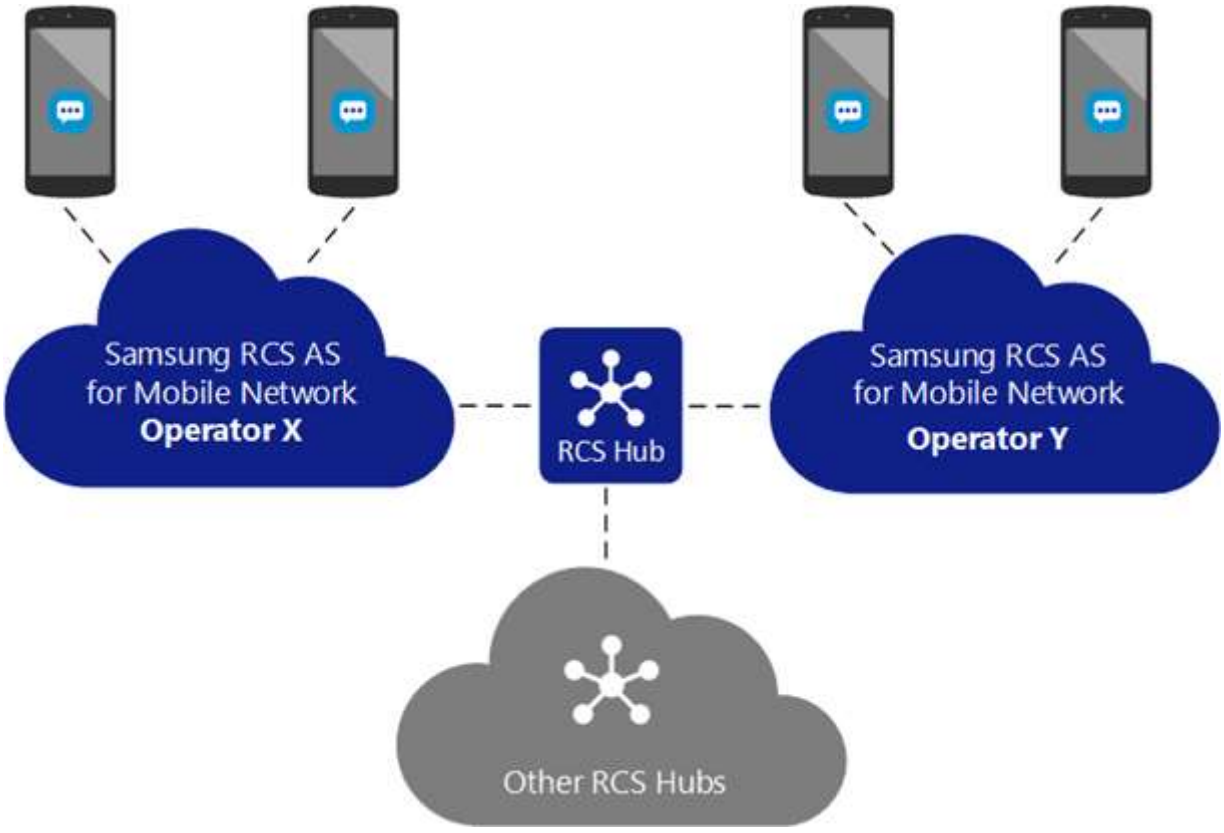
The new features that RCS offers bring carrier messaging to the modern day, while its standards lay a path for the future. Unlike other text messaging solutions, the standards-based nature of RCS allows it to operate across networks, devices, and messaging apps. The end goal of this effort is that, just like SMS, you won't have to think about if the recipient has the right app installed—it will simply work.

The Samsung RCS Solution

As part of Samsung, SigMast has developed the Samsung RCS Solution. This follows the RCS standards and include all the parts needed for an operator to deploy RCS.

Samsung RCS AS is the core RCS messaging service that operators can deploy. It has been designed from the ground up to follow the RCS standards and is accredited by the GSMA. For carriers, this service allows them to deploy RCS without having to devote time and money into creating their own solution from scratch.

Samsung RCS Hub is another piece of the solution. This component facilitates connections between carriers that use Samsung RCS AS, as well as those that use their own or another RCS service provider. This allows messages from any RCS supported device to reach another when they are on separate networks or use different RCS service providers.



A third piece that makes RCS work is the messaging client (app) and the device itself. Almost all Android devices sold today and both the major messaging apps, Samsung Messages and Google Messages, support RCS standards. This support allows subscribers who may use different devices or clients to message each other using RCS.

Using RCS

To take advantage of RCS, your carrier first needs to have implemented the service and you need to use an RCS-enabled device and client. Additionally, the recipients of any RCS messages you send must have that same level of support or your message will revert to SMS. Currently, most new Android devices include RCS support so carriers need to add the final piece. There are many carriers that already support RCS and more carriers are adding support for it by the day.