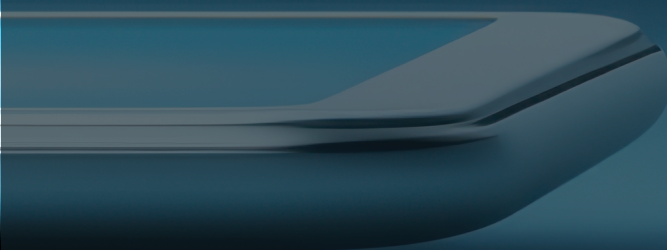




How to build a successful startup

Design research for founders
and startup teams



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This book is a guide for people who are thinking about entering the startup world by designing, developing and selling a new product. It's based on my years experience of working with founders from a wide range of industries, including transport, education and healthcare. It explores the key things founders should consider before they get started and lays out a tried-and-tested process for developing and selling successful products.

The action sections give you practical steps to move your thinking forward. Before you begin, you may want to open a separate document to keep track of your answers.

Nightingale Design Research is a consultancy founded in 2016 by Frances and Michael Brown. Since then, the Nightingale team has worked with a range of large organisations such as LEGO, the NHS, the Department for Education and Balliol College Oxford, as well as many startups and scaleups, providing rigorous research that supports the development of successful innovative products and services.

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Figure out what you want



The first thing I always advise anyone considering startup life is to think about what they, personally, want from the whole experience. The answer to this question will influence every other decision you make, so be honest with yourself.

Do you want to build a complex, thriving and demanding business that takes up years of your life? Are you hoping to change the world, or shape society in some fundamental way? Do you want to be a boss, someone who makes decisions about other people's livelihoods? Are you looking for quick riches? Fame and fortune? Are you hoping to build some value that you can sell quickly before you move onto something new?

If you're not clear on what you want, take some time to think about it. If you want simplicity, flexibility and a stable income, startup life is most likely not for you. If you're not interested in managing a complex organisation, then you need to be wary of getting pulled into that role over time. If you want fame and fortune, there may be easier options! Bear in mind that not every startup needs to be a unicorn - you are allowed to want to build a small but sustainable business that provides interesting and satisfying work for you and a small team.

Being clear on what you want will help you to make decisions that are right for you. More importantly, it will help to reduce the risk of ending up in a situation that makes you miserable. For example, if you hit success quickly and someone offers investment, your response will be influenced by your original aim. If your aim was rapid growth and a quick exit, investment might make sense. If your aim was to slowly build a business with strong core values, the limitations and expectations that often come with investment may frustrate and ultimately put an end to your goals.

Think carefully about what 'success' looks like to you - if you're clear on that, you're much more likely to get there.

Once you're aware of what you want, consider what it'll take to achieve it in terms of time and money. While there are plenty of stories of 'overnight success' in the startup world, the reality is that many companies take years to get off the ground. You may need to work for little or no pay for quite some time, with no guarantee of success. While the level of risk you take is up to you, make sure you take it with your eyes open - don't stumble into regretting years of wasted income or effort. Running a startup can be an energising, fun, exciting experience. It can also be stressful and scary, particularly if things don't go the way you expect them to. It's ok to opt out or to delay until you're in a better position to take the leap.

If you've decided startup life is for you, it's important to ensure you have some sort of support. The ideal situation is to have one or more reliable co-founders, with complementary skills, who are just as invested in the business as you are. Not only do co-founders relieve the burden of doing everything single-handedly, they also provide a sounding board, someone to talk problems through, practical backup and emotional support. Of course, it's not always possible to find someone suitable, in which case partners, friends, former colleagues and connections are all a vital source of reassurance and encouragement. Connect with fellow entrepreneurs from any industry as soon as possible, through networks, online groups, accelerators and meetups - they are in the same boat and will be happy to share tips, woes and warnings, as well as providing introductions and recommendations.

Action

My vision

Fast forward 3-5 years. Everything has worked and your startup is successful. Write a detailed description of what your life looks like. Describe your working day and your working life overall. To guide your description, consider the following questions:

- What are you trying to achieve, both personally and professionally? Do you want to be seen as a well-respected expert in a particular field? Do you want to run a multi-million pound corporation? Do you want a small, sustainable business with strong values?
- What does success look like, both personally and professionally? Are you happy to work long hours for years, or do you want a good work/life balance?
- What will your business look like? Are you hoping to run your business personally for a long time, get someone else in to run it, or sell it as soon as possible?
- Will you be managing staff? Will you have a co-founder? Will you hire someone to take care of the day-to-day functioning of the business?

You should consider these questions no matter what type of product or business you're building. They are about you, your goals and what you ultimately want to get out of creating a business. Consider whether your goals align with your current plans and actions. Are you heading in the right direction? Do you need to change course?

Ensure your idea is a good one

It's a well-known fact that a large proportion of startups fail. There are many reasons for that, but in my experience, the most common reason is that the idea that the startup is built on is, fundamentally, a bad idea.

Either nobody wants/needs it, or there is a serious flaw in the business model that means the business will never sustain itself.

There is a lot of mythology in the startup world, particularly around tech, that suggests that successful startups are created by genius founders who are inspired with a fully-formed, fantastic idea that they single-mindedly implement and push out into an excited and hungry market. While a very small number of founders do hit on a billion-dollar idea quickly, many more come up with ideas that sound good on paper, but that don't survive contact with the real world - hence the high failure rate.

To be successful, a business needs to deliver a product that customers want to use and, more importantly, want to buy. Creating such a product is typically a slow and laborious process, requiring a lot of thinking, experimenting, testing and redesigning. It also requires the ability to stop, or pivot, when it becomes clear that an idea doesn't have potential. Even a brilliant idea takes time to shape into a real product - elements like the visual design, business model, pricing, marketing and materials all require careful consideration. Each new decision affects all other decisions, requiring a constant review and re-balancing of priorities. It's a delicate and often daunting process, with a bewildering amount of detail. It's common for founders to become overwhelmed with the sheer number of decisions to be made, resulting in their energy becoming diverted and drained. So what can be done to keep things on track?

Write a coherent product story

There is a lot of advice available about business modelling, product-market fit, financing and building a great team. These are all important parts of building a successful business, but before any of these elements are even considered, it's vital to define the core value your business is delivering, to customers, to the market as a whole and, most importantly, to you as a founder. The idea your business is built on must be clearly articulated, as it provides the foundation for literally everything else you do, from design to marketing to selling. If that foundation is weak or wobbly, there is a constant danger your business will collapse.

One way to define the value your business delivers is by telling your product story - a narrative that details what the product is, what it does, who it's made for and why they would buy it. This story provides the focus and motivation for the business and informs and guides decision-making. It also feeds into marketing, funding pitches and business plans.

Product stories vary but good stories have three things in common: they are simple, logical and true.

Less is more

It's common for founders to start out with a complex, multi-layered idea - they want to solve a huge societal problem, or deliver a product with 100 different features. While ambitious long-term goals can be motivating, they can also lead to overwhelm and a lack of focus. The best early-stage stories are simple and easy to understand - it's clear what the product or service is, what it does and who it's for and it can be delivered with relative ease.

Demonstrate cause and effect

It may seem obvious, but in my experience it needs to be said - your story should make sense. To an investor or a buyer, the value you're delivering or the outcomes you're expecting should be easy to understand. If you have to resort to a long and convoluted explanation of how the business will deliver value, or make money, chances are your idea is too complex and has too many potential points of failure.

Stick to non-fiction

It's fine if your initial concept is drawn entirely from your imagination - you have to start somewhere - but over time, you must back up any beliefs you have about your market, your users, your product and your business plan with hard facts and evidence. Any claim you make in your product story, about what your product does or who will buy it, needs to have real and recent data behind it. Otherwise you run the risk of developing products for fictional users, or solving fictional problems, both of which don't make for a successful business.

Research comes first

The only way to ensure your product story is simple, logical and true is by doing research. In this context, research means anything you do to gather relevant, actionable information, including searching the internet and talking to friends. Without research, you are at risk of making important decisions based on guesswork, assumptions and imagination - all of which are very likely to lead you astray.

Action

My product story

Your product story should be a coherent, believable description of the value your product provides to your users and your customers. It should be simple, logical and true. At first, your product story may be based on speculation or imagination, but as time goes on, it should be backed up by data and evidence. It should go through multiple iterations, becoming clearer and more focused at each iteration. If the evidence indicates that you're going in the wrong direction, you may need to tweak or entirely change your story.

Write down the first iteration of your product story, explaining who would use it, what it does and what value it gives your user.

Ask yourself the following questions:

- Is your product story easy to understand?
- Does it seem logical and believable?
- What assumptions have you made about your user, your product or your market?
- What evidence do you already have that your users want or need your product?

Do your research

Research isn't about gathering large amounts of data and statistics - it's about asking the right questions to inform your decision-making. Every piece of research you do should be linked to a key decision - if it isn't, then it may provide some useful background information, but it's unlikely to move you forward very much.

When developing an idea, the first question you might want to ask is 'What problem are we solving?' or 'What need/want are we fulfilling?' These seem like simple questions, but answering them may not be as straightforward as you think, as it requires a deep understanding of your potential users and their needs as well as the wider environment that they live/work in. The goal of asking this question is to ensure that your product or service will do something useful or desirable, something customers will pay for.

Asking these questions will help to ensure that you don't make any of these common startup mistakes:

- Solving a problem that doesn't exist/solving the wrong problem
- Solving the right problem in the wrong way
- Solving a problem that is too niche/obscure for the solution to be financially viable
- Solving a problem that is so complex, even a basic solution will take years to deliver

Usually, if you're fulfilling a real need, or solving a real problem, solutions will already exist. It's worth exploring these solutions, as they will give good insight into what users need, what's missing and what is possible.

Methods

Start with a search engine

One very simple form of research that often goes overlooked is what is known as 'desk research' - the fancy term for sitting down and searching for information on a topic. No matter what type of product or service you're developing, there will be blogs, articles, reviews and reports that will provide valuable insight and information. Depending on the area you're working in, there may also be a wealth of basic research available in journal articles and books.

Your aim at this point will be to understand the world in which your product or service will live.

This includes the nature of the market, other products and services in that space, your potential users/customers and anything else that may be relevant to your business, such as regulation, legislation, policy, changing technology and potential physical or technological facilitators and barriers. It's also worth finding out if someone has tried to deliver your solution in the past and failed - if possible, learn from their mistakes.

With desk research, it makes sense to begin at a broader, more general level, narrowing the focus over time. It's very unlikely that desk research will provide all the knowledge you need - as you delve more and more into existing content, specific questions about your focus area should start to arise.

As you're reading, record what each piece of research is telling you:

- Is it confirming what you thought, or challenging it?
- Are some aspects of what you're reading confusing or inconsistent?
- Have you come across new concepts or ideas that are relevant to your area of focus?
- What key questions remain unanswered?

Action

Desk research

Desk research involves exploring readily available sources of information - journal/newspaper articles, blogs, reports, websites, that gather information on your market, your user, your competitors and the world in which your product will eventually exist.

List the sources you have used.

As you go through these sources, write down any interesting, surprising, potentially useful or worrying pieces of information. For example, did another company try to launch a product like yours and fail? Did you come across a rule or regulation that may impact your product? Does an article indicate a gap in the market/customer demand for your product?

As you read through these sources and answered questions, what other questions popped up? Were there key pieces of information that the desk research couldn't give you?

List as many questions as you can think of - don't hold back!

The background and context of your product story should be starting to take shape at this point, with a clear and realistic overview of the situation in which your future product or service will begin to develop and grow. You should return to your desk research again and again during the development of your business, as new questions and information come to light.

Talk to those in the know

Once you've done your initial desk research, the next step is to talk to industry experts. Many experts are happy to share their knowledge for free, but it is usually polite to offer to compensate someone for their time.

Talking to someone who knows an industry inside and out can be hugely valuable - they will flag up potential pitfalls, warn you of barriers and roadblocks and perhaps even provide you with some valuable ideas.

They might provide you with contacts or with places you can go to find further information. Use their insight - they can cut through a lot of confusion and provide the sort of detailed, up-to-date information that can be difficult to get from written sources.

Action

Talk to experts

List some people who are experts in the area/problem your product addresses.

- Can you approach any of these people, via social media, contacts or events?
- Can you request to interview any of them, to ask in-depth questions about the area/problem?

Remember that people who are used to giving talks and sharing expertise may expect to be paid for an hour of their time.

List the questions you would like to ask someone who is very familiar with your industry, problem or market. Record any information you gather from industry experts.

Research your user before you begin your build

Your user is the person who will engage directly with the product, while your customer is the one who will pay for the product. They may or may not be the same person - for example, a nurse may use your product but the customer may be a hospital or NHS trust. There may be multiple user groups, who operate in different contexts and need different things. Both the customers and the users must be taken into account when designing your product or service - balancing their needs can be a tricky process, particularly if there is a clash of priorities.

Traditional startup wisdom advises founders to create a prototype or minimum viable product (MVP) and start to push that out to users as soon as possible to see if the product gains traction and to gather feedback. This is the wrong approach. Research with your users must come first.

If you begin designing or developing your product, even on a very basic level, before you've carried out any research on your user, then essentially you are designing in the dark.

Without research you run the risk of making many important design decisions, from the basic concept of the product to the look and feel, based on guesswork, rather than on any real understanding of what your users need.

If you go ahead and push this guess-based MVP out to the market and you find it fails (as many MVPs do), it will be very difficult to untangle which of those design decisions were wrong - is the basic concept flawed, or are users struggling because the structure of the pages is back to front?

There is the obvious risk that you will waste time, money and effort on developing an MVP for a product no one wants, needs or will pay for, but there is also the risk that MVP failure prompts you to abandon the idea, when in fact the idea is solid, it was just your execution that was poor.

If you carry out research with users first, then you can:

- **get a clear picture of who it is you're designing for** and what they need before you create any sort of design.
- **verify and test design decisions**, to understand which ones work and which ones don't, making it far easier to refine your idea quickly and effectively.
- **discover you're on the wrong track before you've spent a lot of money on an MVP** that was doomed to fail.

At the same time, good research can often show you another, more promising direction to take.

Planning and preparing for research

When planning a piece of research, the key things you need to consider are:

- Decisions the research will influence
- What (if anything) is already known
- Questions you want to answer
- Potential constraints to the research (e.g. this is a new area, so content is sparse)
- Potential research methods

The template below will help you to plan and prepare for a piece of research. It is also available to download [here](#).

Get to know your user

For your product to be successful, your target users have to choose to engage with it. If your users don't want, need or understand your product, it's likely that they'll completely ignore it.

Understanding your users - how their lives work, the problems they face, the things they want and need - will allow you to create products that they desire, seek out and, most importantly, will pay for.

When you begin, you may not be entirely sure who your user is - you might have a general idea of the type of person who you think will engage with your product, but no insight into their specific characteristics or needs. Where this lack of insight can become a problem is if your eventual product design misses your target - for example, you create a high-cost product but your target user lacks funds, or you develop a very technical product when your ideal target is not tech-savvy.

Narrowing down who your product is for will help to make important decisions about the structure, costing and complexity of your product.

It will also help to shape how you sell your product - if your users tend to shop in person rather than online, for example, then you may need to consider in-store advertising and promotions.

Building your knowledge

Desk research should provide at least some high-level insight into your potential market, however, it is unlikely to provide you with the amount of detail you need to make evidence-based decisions about the structure and design of your product. For that, you need to talk directly to your potential users, using interviews and focus groups.

Users will generally engage with a product if it is interesting or attractive or if it makes their lives easier in some way. Therefore, when you're creating a picture of the user, your initial focus should be on the value your product will deliver to them. Will it provide pleasure and enjoyment? Will it solve a particular problem, or help them complete a task quickly and accurately?

What you ultimately want to understand is why a particular user will open their wallet and give you money for your product, but you have to begin with an understanding of the realities of your users' lives - what they do, what they find difficult and what problems they would like to solve. The simplest place to start is by identifying some people who seem to fit your user group and talking to them. Some may talk to you for free, but ideally you should offer around £20-50 for their time, depending on how long the session will take.

Asking the right questions

The value of the data and insight you collect will depend on the quality of the questions you ask.

One common mistake founders make is to show potential customers/users a product concept and ask them 'would you use this?' or 'would you buy this?'

The answer your user gives to these questions is likely to be of very little value - they are imagining a product, which may or may not resemble what you'll actually produce, and they are predicting future behaviour based on this imaginary product. There are too many complicating factors involved for their answer to be considered accurate or reliable.

When researching with users, your goal is to understand the parts of their lives that are relevant to your product, so you can figure out how your product will (or won't) fit. You can do this by asking questions about their day to day tasks, the problems they face and the solutions they use.

When designing questions, focus on topics that are meaningful to your user. Keep your questions open - the more a user is allowed to explore a topic, the more likely they are to give you valuable, unexpected details. Don't ask hypothetical questions, leading questions, or questions that are difficult for your user to answer. Ensure questions are concrete and relate directly to the user's own life and experiences. Ask about specific situations, tasks and problems.

The range of questions you might ask depends on the product and the people involved, but some examples are:

- **Tell me about the last time you completed X task**
 - What aspects were easy?
 - What aspects were difficult?
- **What tools do you use to do X?**
 - Why did you choose these tools?
 - Which tools work well?
 - Which tools don't work so well?
- **Talk me through the process of making a decision about Y**
 - What are the key pieces of information that you consider?
 - Is there anything that makes this decision difficult?

You might also show your user a basic concept or prototype and talk them through it to gather specific feedback on an idea or a design. Be aware that feedback on early concepts can be patchy as it is often difficult for users to imagine how a product might function in the real world. At this point you are looking for initial reactions and any potentially serious blockers or barriers, rather than solid data on how effective a product might be.

Action

Get to know your user

Describe your target user in as much detail as possible, including typical age, location, occupation (if relevant). Consider the following questions:

- How might they come in contact with your product?
- Through work/play?
- What might prompt them to use your product?
- Have they encountered a problem, or do they need to complete a task?
- What do they currently use to solve this problem or complete this task?
- What might stop them from using your product?

To really know your user, you must speak directly to them and, ideally, observe them solving the problem or completing the task you are interested in. That way you can be sure the things you think about them are actually correct.

Identify some target users to interview. These may be colleagues, friends or people you contact via social media. You can also use professional recruitment companies to find specific people for you. If you are asking people you don't know to give up their time, you should offer them an incentive of at least £20 per hour.

Write some questions you would like ask your users.

Shape your design

Once you've verified your idea is a good one, done some basic research and gathered key information on your users, the next step is to use the insights you've generated to create a product that fits what your users need. This is an iterative process, where each decision and change is tested with users and verified before a new decision is made. Designing iteratively ensures that you flag up issues quickly, without the need to dig back through multiple changes to identify failures.

When you're designing and testing your product, you need to consider two different aspects - what the product delivers as a whole, in terms of purpose and value, and how the product functions, i.e. structure, screens and functionality. While they're closely related, they also need to be looked at separately. For a product to be truly successful, both the concept and execution have to work for users.

Design and test quickly and cheaply

Don't be lured into building a complex and costly MVP too soon - there are far simpler, cheaper ways to test your concept and your design. For example, you can quickly draw screens on pieces of paper and ask a user to pretend to complete a task. This is known as 'paper prototyping.'

Once you have a good idea of how the product should function, you can progress to building wire-frames, using tools like Figma. Don't worry too much about branding, or look and feel - these are important, but to begin with you should focus on functionality.

The key questions you should consider when testing designs is:

- Do users understand what the product does? Is the concept clear to them?
- Do they identify ways in which they could use the product in their lives?
- Do they talk about how this product could fit into their current processes/way of doing things?
- Does the structure of the product make sense to them? Do they feel anything is missing?
- If asked to complete a simple task, do they understand how to move from one screen to another? Are there any points of confusion?

The obvious benefit of testing regularly is that it quickly flags up features and changes that users don't want or need, ensuring that you don't waste time building things that don't have a future. A less obvious but more valuable benefit is that seeing a person engage with your product brings it to life, allowing you to see how it might exist as a real product. Having a more realistic idea of how your product will function allows you to identify issues such as rigid workflows or regulatory barriers that might not have otherwise been obvious.

It also throws up potential opportunities and ideas that wouldn't have occurred to you in isolation. In short, it allows you to see into the future, cutting out the guesswork that tends to result in startups getting distracted and bogged down.

Action

Design and test quickly and cheaply

On loose pieces of paper, draw some examples of key aspects of the product - screens, structure, key functionality (it doesn't have to look good!). Put these drawings in front of a user.

- Do they understand what your product does?
- Listen to how they talk about it - are they confused?
- Do they expect something that isn't there?
- Do they think it's a great idea?
- What aspects of the design might need to change?

Write what you've learned.

Sustain your success



Building a great product is just the start of the story - to be successful, you also need to build a great business. Research can be used to shape and inform every aspect of a company's strategy, structure and growth. Below are some examples:

Building a feasible business model

Having a clear understanding of your user and your customer will allow you to build a realistic, sustainable business model that is based on a real knowledge of what users value and what they will pay for. It will also allow you to monitor how well your business model is working - for example, research with your users may indicate that they are confused by your subscription options and would potentially upgrade more quickly if the offer was clearer.

Branding and marketing

When you speak to your users, you will gather insight into what they need from your product in practical terms and you will also develop an understanding of them as people - the language they use, the things they value, the ways in which they view your product. This understanding will allow you to shape a brand that appeals to them and speaks to them in a genuine way and to create a marketing strategy that is tailored to how they view and engage with the world.

Growing and expanding the business

Once there is an established customer base for a particular product with a defined range of features, ongoing research with those customers will provide a wealth of valuable and detailed information on the difference your product is making to their lives.

It will also flag up the potential to grow the customer base by adding new features or by developing an entirely new product to meet a newly identified set of needs.

Action

Sustain your success

Identify where your research can inform other aspects of your business. Did your user research give you insight into the sort of business model you should build? Did you get an understanding of how users talk about and relate to your product?

Research doesn't end when the product is designed - it should continue, day to day, as you build your business. List some areas that you would like to research as you grow your business.

Useful Resources

Visit Nightingale Design Research for free resources to support your startup journey:

- [Work with your team to identify dangerous assumptions](#)
- Plan your research by using our [guide](#) and research planning [canvas](#)
- Find the right people with our [participant recruitment guide](#)
- [Learn how to create a survey](#)
- [Find out how to interview users](#)
- [*Make Products That Matter*](#) is a fantastic book by Dr Chloe Sharp that takes you through the steps of creating a successful product and a thriving business.

If you would like us to plan and deliver your research, [get in contact](#).