# 🌟 Glass PDF Generator - Chrome Extension

A modern Chrome extension that generates pixel-perfect PDFs from web pages and local files with a stunning glass-morphic interface.



Glass PDF Generator

## ✨ Features

### 🎨 Glass-Morphic Interface

* **Modern Design**: Beautiful glass-morphic UI with blur effects and translucent elements
* **Responsive Layout**: Adapts seamlessly to different screen sizes
* **Smooth Animations**: Fluid transitions and micro-interactions for enhanced UX

### 📄 Advanced PDF Generation

* **Pixel-Perfect Rendering**: Canvas-based generation avoiding print CSS issues
* **High-Quality Output**: Professional PDFs with proper scaling and resolution
* **Smart Page Breaks**: Interactive page break adjustment with drag-and-drop
* **Element Exclusion**: Click to exclude unwanted elements from PDF

### 🛠️ Professional Tools

* **Interactive Overlays**: Visual page break management with real-time preview
* **Element Selection**: Intuitive click-to-exclude interface with highlighting
* **Custom Settings**: Comprehensive PDF customization options
* **Multiple Formats**: Support for various page sizes and orientations

### 🔧 Advanced Features

* **Background Processing**: Service worker for efficient PDF generation
* **Local File Support**: Generate PDFs from local HTML files
* **Download Management**: Integrated download with progress tracking
* **Built-in Viewer**: Modern PDF viewer with zoom, navigation, and tools

## 🚀 Installation

### From Chrome Web Store (Coming Soon)

1. Visit the Chrome Web Store
2. Search for “Glass PDF Generator”
3. Click “Add to Chrome”

### Manual Installation (Developer Mode)

1. Download or clone this repository
2. Open Chrome and navigate to chrome://extensions/
3. Enable “Developer mode” in the top right
4. Click “Load unpacked” and select the extension folder
5. The Glass PDF Generator icon will appear in your toolbar

## 📖 Usage

### Quick PDF Generation

1. **Navigate** to any web page
2. **Click** the Glass PDF Generator icon in the toolbar
3. **Click** “Generate PDF” for instant conversion
4. **Choose** save location and download

### Advanced Configuration

1. **Click** “Advanced” in the popup for detailed settings
2. **Adjust** page format, orientation, scale, and margins
3. **Enable** options like background printing and viewer mode
4. **Generate** with custom settings

### Interactive Page Management

1. **Click** “Adjust Breaks” to manage page breaks
2. **Drag** the blue lines to reposition page breaks
3. **Add** new breaks or reset to defaults
4. **Save** changes and generate PDF

### Element Exclusion

1. **Click** “Exclude Elements” to enter selection mode
2. **Click** on page elements to exclude them from PDF
3. **See** real-time highlighting of excluded elements
4. **Save** selections and generate clean PDF

## 🎯 Key Benefits

### For Web Developers

* **Accurate Rendering**: No more broken layouts in PDF exports
* **Developer Tools**: Element inspection and exclusion capabilities
* **Local File Support**: Test HTML files before publishing

### For Content Creators

* **Professional Output**: High-quality PDFs for presentations and documents
* **Custom Formatting**: Full control over page layout and appearance
* **Batch Processing**: Efficient handling of multiple pages

### For End Users

* **Simple Interface**: One-click PDF generation with beautiful UI
* **Reliable Results**: Consistent, professional PDF output
* **Modern Experience**: Glass-morphic design that’s pleasant to use

## 🔧 Technical Specifications

### Architecture

* **Manifest V3**: Latest Chrome extension standard
* **Service Worker**: Background processing for efficiency
* **Content Scripts**: Page interaction and overlay management
* **Canvas Rendering**: High-quality image capture

### Supported Features

* **Page Formats**: Letter, A4, Legal, A3, Custom sizes
* **Orientations**: Portrait and Landscape
* **Scaling**: 10% to 500% with custom values
* **Margins**: Customizable margins in inches
* **Quality**: 300 DPI for print-ready output

### Browser Compatibility

* **Chrome**: Version 88+ (Manifest V3 support required)
* **Chromium**: Based browsers with extension support
* **Edge**: Chromium-based Edge browsers

## 🛡️ Privacy & Security

### Data Protection

* **No Data Collection**: Extension works entirely locally
* **No External Servers**: All processing happens in your browser
* **Secure Processing**: Uses Chrome’s built-in PDF capabilities

### Permissions

* **Active Tab**: Access current page for PDF generation
* **Downloads**: Save generated PDFs to your computer
* **Storage**: Save user preferences and settings
* **Scripting**: Inject content scripts for page interaction

## 🔄 Updates & Support

### Version History

* **v1.0.0**: Initial release with full feature set
* Modern glass-morphic interface
* Advanced PDF generation capabilities
* Interactive page break management
* Element exclusion system

### Getting Help

* **Issues**: Report bugs or feature requests on GitHub
* **Documentation**: Comprehensive guides and tutorials
* **Community**: Join discussions and share feedback

## 🏗️ Development

### Project Structure

chrome-pdf-extension/  
├── manifest.json # Extension manifest  
├── background.js # Service worker  
├── popup/ # Extension popup  
│ ├── popup.html  
│ ├── popup.css  
│ └── popup.js  
├── content/ # Content scripts  
│ ├── content.js  
│ └── overlay.css  
├── pdf-viewer/ # Built-in PDF viewer  
│ ├── viewer.html  
│ ├── viewer.css  
│ └── viewer.js  
├── utils/ # Utility functions  
│ ├── pdf-generator.js  
│ └── helpers.js  
└── assets/ # Icons and resources  
 └── icons/

### Key Technologies

* **JavaScript ES6+**: Modern JavaScript with async/await
* **CSS Grid/Flexbox**: Responsive layout system
* **Chrome Extension APIs**: Native browser integration
* **Canvas API**: High-quality image rendering
* **CSS Backdrop-Filter**: Glass-morphic effects

## 📝 License

This project is licensed under the MIT License - see the <LICENSE> file for details.

## 🙏 Acknowledgments

* **Chrome Extension Team**: For excellent documentation and APIs
* **Glass-morphism Community**: For design inspiration
* **Open Source Contributors**: For libraries and tools used

**Made with ❤️ for the web development community**

*Transform any web page into a beautiful PDF with the power of modern web technologies and glass-morphic design.*