Migrating from Paperclip to Active Storage

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What is Active Storage?

- Added to Rails 5.2 (April 2018)
- Easily attach files to ActiveRecord objects
- Upload files to the cloud storage
- Local storage for development and testing
- Mirroring to many clouds storages
- Lazy resizing
- Direct upload from a browser to a cloud

Why migrate from Paperclip?

- After Active Storage has been released
- Paperclip has been [deprecated](#) after 11 years of active development
- Active Storage is native solution inside Rails

Configuration

- Migration adds 2 database tables
  ```
  active_storage_blobs
  active_storage_attachments
  ```

- `config/storage.yml` defines storage places

- `config/environments/*.rb` defines current storage
  ```
  config.active_storage.service = :amazon
  ```

Attaching and removing file

```ruby
class User < ApplicationRecord
  has_one_attached :avatar
end


user = User.create!(user_params)


user.avatar.attach(params[:avatar])
user.avatar.attached?


user.avatar.purge
user.avatar.purge_later
```

Linking files and images

```ruby
url_for(user.avatar) # URL for 5 minutes

# download link
rails_blob_path(user.avatar, disposition: "attachment")

gem 'mini_magick'

# image preview with lazy resize
image_tag user.avatar.variant(resize: "100x100")

# video or PDF preview
image_tag file.preview(resize: "100x100>")
```

Request / response

```
$ curl -I https:// test.com/rails/active_storage/blobs/VERY-LONG-ID/avatar.png

Content-Type: text/html; charset=utf-8
Status: 302 Found
Cache-Control: max-age=300, private
Location: https:// test.s3.eu-west-1.amazonaws.com/VERY-LONG-PARAMS…

GET Location...

Status: 200 OK
Content-Disposition: inline; filename="avatar.png"
Content-Length: 419976
Content-Type: image/png
```

Migration (common steps)

- Setup and configure Active Storage
- Copy Paperclip data (many tables) to Active Storage tables (2 tables)
- Leave the files locally with Paperclip paths
- Moving files locally from Paperclip paths to Active Storage paths
- Configure the Active Record models
- Upload local files to a cloud
- Update tests, views, controllers and models
- Add validations
- Remove Paperclip

Migration (Konfeo steps)

- Setup and configure Active Storage
- Add attachment to models (with different name)
- Handle both Paperclip (old) and Active Storage (new) attachments
- Monitor AWS S3 and app performance
- Run migration script and upload all Paperclip attachments to AWS S3
- Remove Paperclip from the codebase

Thank you :)

Questions?