Phase 1: System Configuration - CitaPlanner

Overview

Phase 1 adds comprehensive system configuration capabilities to CitaPlanner, including service categories, notification templates, and multi-channel notification support (Email, SMS, WhatsApp).

Features Implemented

1. Service Categories

- Organize services into categories for better management
- Color-coded categories for visual organization
- Optional categorization (services can exist without categories)

2. Notification System

- Multi-channel support: Email, SMS, WhatsApp
- Template-based notifications: Create reusable notification templates
- Notification logging: Track all sent notifications with status
- Variable substitution: Dynamic content in templates

3. Database Schema

New Tables

- service_categories : Service categorization
- notification_templates : Reusable notification templates
- notification_logs : Audit trail of all notifications

Modified Tables

- services: Added optional categoryId field
- appointments : Added notificationsSent boolean field

API Endpoints

Services

- GET /api/services List all services
- POST /api/services Create new service
- GET /api/services/[id] Get service details
- PUT /api/services/[id] Update service
- DELETE /api/services/[id] Delete service

Service Categories

- GET /api/services/categories List all categories
- POST /api/services/categories Create new category
- GET /api/services/categories/[id] Get category details
- PUT /api/services/categories/[id] Update category

• DELETE /api/services/categories/[id] - Delete category

Notifications

- GET /api/notifications/templates List templates
- POST /api/notifications/templates Create template
- GET /api/notifications/templates/[id] Get template
- PUT /api/notifications/templates/[id] Update template
- DELETE /api/notifications/templates/[id] Delete template
- POST /api/notifications/send Send notification manually
- GET /api/notifications/logs View notification history
- POST /api/notifications/test Test notification channels

Environment Variables

Add these to your .env file:

```
Email Configuration (SMTP)
SMTP_HOST="smtp.gmail.com"
SMTP_PORT="587"
SMTP_USER="your-email@gmail.com"
SMTP_PASSWORD="your-app-password"
SMTP_FROM="noreply@citaplanner.com"

# SMS Configuration (Twilio - Optional)
TWILIO_ACCOUNT_SID="your-twilio-account-sid"
TWILIO_AUTH_TOKEN="your-twilio-auth-token"
TWILIO_PHONE_NUMBER="+1234567890"

# WhatsApp Configuration (Evolution API)
EVOLUTION_API_URL="https://your-evolution-api-url.com"
EVOLUTION_API_KEY="your-evolution-api-key"
EVOLUTION_INSTANCE="your-instance-name"
```

Evolution API Setup

What is Evolution API?

Evolution API is a RESTful API for WhatsApp messaging that allows you to send and receive WhatsApp messages programmatically.

Configuration Steps

1. Get Evolution API Instance

- Sign up for Evolution API service
- Create a new instance
- Note your instance name

2. Get API Credentials

- Obtain your API key from the dashboard
- Note your API URL (e.g., https://api.evolution.com)

3. Connect WhatsApp

- Use the Evolution API dashboard to connect your WhatsApp number

- Scan the QR code with your WhatsApp mobile app
- Wait for connection confirmation

4. Configure CitaPlanner

```
- Add credentials to .env file:
```

```
env
    EVOLUTION_API_URL="https://your-api-url.com"
    EVOLUTION_API_KEY="your-api-key"
    EVOLUTION INSTANCE="your-instance-name"
```

5. Test Connection

- Use the test endpoint: POST /api/notifications/test
- Verify WhatsApp connection status

Evolution API Endpoints Used

```
POST /message/sendText/{instance} - Send text message
json
{
    "number": "5215551234567",
    "text": "Your message here",
    "delay": 0,
    "linkPreview": true
}
```

• GET /instance/connectionState/{instance} - Check connection status

Phone Number Format

- Include country code without + or spaces
- Example: Mexico 5215551234567 (52 + 10-digit number)

Template Variables

Available variables for notification templates:

- {{clientName}} Client's full name
- {{serviceName}} Service name
- {{appointmentDate}} Appointment date
- {{appointmentTime}} Appointment time
- {{professionalName}} Professional's name
- {{branchName}} Branch name
- {{price}} Service price

Example Template

Email Template:

```
Subject: Confirmación de Cita - {{serviceName}}

Hola {{clientName}},

Tu cita para {{serviceName}} ha sido confirmada.

Detalles:
    Fecha: {{appointmentDate}}
    Hora: {{appointmentTime}}
    Profesional: {{professionalName}}
    Sucursal: {{branchName}}
    Precio: {{price}}
```

WhatsApp Template:

```
Hola {{clientName}}! 

Tu cita está confirmada:

{{appointmentDate}} a las {{appointmentTime}}

{{serviceName}}

Con {{professionalName}}

{{branchName}}

{{price}}

Nos vemos pronto!
```

Usage Examples

Creating a Service Category

```
const response = await fetch('/api/services/categories', {
  method: 'POST',
  headers: { 'Content-Type': 'application/json' },
  body: JSON.stringify({
    name: 'Cortes de Cabello',
    description: 'Servicios de corte y peinado',
    color: '#FF6B6B',
  }),
});
```

Creating a Service with Category

```
const response = await fetch('/api/services', {
  method: 'POST',
  headers: { 'Content-Type': 'application/json' },
  body: JSON.stringify({
    name: 'Corte Caballero',
    description: 'Corte de cabello para caballero',
    price: 250,
    duration: 30,
    categoryId: 'category-id-here',
  }),
});
```

Sending a Notification

```
const response = await fetch('/api/notifications/send', {
  method: 'POST',
  headers: { 'Content-Type': 'application/json' },
  body: JSON.stringify({
    type: 'WHATSAPP',
    recipient: '5215551234567',
    message: 'Tu cita ha sido confirmada para mañana a las 10:00 AM',
    appointmentId: 'appointment-id-here',
  }),
});
```

Testing Notification Channels

```
const response = await fetch('/api/notifications/test', {
  method: 'POST',
});

const result = await response.json();
// { email: true, sms: false, whatsapp: true }
```

Non-Breaking Changes

All Phase 1 changes are completely non-breaking:

- 1. New tables only (no modifications to existing tables except optional fields)
- 2. Optional categoryId in services (nullable)
- 3. Optional notificationsSent in appointments (default: false)
- 4. **V** Existing appointments continue working without modifications
- 5. Services work with or without categories
- 6. Notifications are opt-in (not automatic)

Migration

The database migration was created and applied:

- Migration name: 20251007200241 phase1 system configuration
- All new tables created successfully
- Existing data preserved

Testing

Build Test

```
cd app
npm run build
```

Database Test

```
npx prisma studio
# Verify new tables exist
```

API Test

```
# Test services endpoint
curl http://localhost:3000/api/services

# Test categories endpoint
curl http://localhost:3000/api/services/categories

# Test notification test endpoint
curl -X POST http://localhost:3000/api/notifications/test
```

Next Steps

After merging Phase 1:

- 1. Configure notification channels in production
- 2. Create notification templates for common scenarios
- 3. Test all three channels (Email, SMS, WhatsApp)
- 4. Create service categories for better organization
- 5. **Update UI components** to use new features

Support

For issues or questions:

- Check notification logs: GET /api/notifications/logs
- Test channels: POST /api/notifications/test
- Review Evolution API documentation
- Check environment variables configuration

Security Notes

- API keys should never be committed to repository
- Use environment variables for all credentials
- Evolution API key should be kept secure
- SMTP passwords should use app-specific passwords
- Twilio credentials should be production-grade

Phase 1 Status: ✓ Complete and Ready for Production

Breaking Changes: X None

Database Migration: Applied Successfully

Build Status: Passing