**Template-Driven angular**

<div class="container">

<div class="row">

<div class="col-xs-12 col-sm-10 col-md-8 col-sm-offset-1 col-md-offset-2">

<form (**ngSubmit**)="onSubmit(f)" **#f**>

<form (**ngSubmit**)="onSubmit()" #f="ngForm">

<div id="user-data" **ngModelGroup**="userData" #**userData**="ngModelGroup">

<div class="form-group">

<label for="username">Username</label>

<input type="text" id="username" class="form-control"

**ngModel** **name**="username" required>

</div>

<button class="btn btn-default" type="button" (click)="**suggestUserName**()">Suggest an Username</button>

<div class="form-group">

<label for="email">Mail</label>

<input type="email" id="email" class="form-control" ngModel

name="email" required email #email="ngModel">

<span class="help-block" \*ngIf="!email.valid && email.touched">Please enter a valid email!</span>

</div>

</div>

<p \*ngIf="!userData.valid && userData.touched">User Data is invalid!</p>

<div class="form-group">

<label for="secret">Secret Questions</label>

<select id="secret" class="form-control"

[**ngModel**]="defaultQuestion" name="secret">

<option value="pet">Your first Pet?</option>

<option value="teacher">Your first teacher?</option>

</select>

</div>

<div class="form-group">

<textarea name="questionAnswer" rows="3"

class="form-control" [(**ngModel**)]="answer"></textarea>

</div>

<p>Your reply: {{ answer }}</p>

<div class="radio" \***ngFor**="let gender of genders">

<label>

<input type="radio"name="gender" ngModel [value]="gender" required>{{ gender }}</label>

</div>

<button class="btn btn-primary" type="submit" **[disabled]="!f.valid"**>Submit</button>

</form>

</div>

</div>

<hr>

<div class="row" \*ngIf="submitted">

<div class="col-xs-12">

<h3>Your Data</h3>

<p>Username: {{ **user**.username }}</p>

<p>Mail: {{ **user**.email }}</p>

<p>Secret Question: Your first {{ **user**.secretQuestion }}</p>

<p>Answer: {{ **user**.answer }}</p>

<p>Gender: {{ **user**.gender }}</p> </div>

</div></div>

import { Component, ViewChild } from '@angular/core';

import { **NgForm } from '@angular/forms'**;

@Component({

selector: 'app-root',

templateUrl: './app.component.html',

styleUrls: ['./app.component.css']

})

export class **AppComponent** {

**@ViewChild('f') signupForm: NgForm;**

defaultQuestion = 'teacher';

answer = '';

genders = ['male', 'female'];

**user** = {

username: '',

email: '',

secretQuestion: '',

answer: '',

gender: ''

};

submitted = false;

**suggestUserName**() {

const suggestedName = 'Superuser';

// this.signupForm.setValue({

// userData: {

// username: suggestedName,

// email: ''

// },

// secret: 'pet',

// questionAnswer: '',

// gender: 'male'

// });

this.signupForm.form.**patchValue**({

userData: {

username: suggestedName

}

});

}

// **onSubmit**(form: **ElementRef**) {

// console.log(form);

// }

// **onSubmit**(form: NgForm) {

// console.log(form);

// }

**onSubmit() {**

this.submitted = true;

this.user.username = this.signupForm.value.userData.username;

this.user.email = this.signupForm.value.userData.email;

this.user.secretQuestion = this.signupForm.value.secret;

this.user.answer = this.signupForm.value.questionAnswer;

this.user.gender = this.signupForm.value.gender;

this.signupForm.reset();

}

}

import { FormArray, FormControl, FormGroup, Validators } from '@angular/forms';

import { Observable } from 'rxjs/Observable';

@Component({

selector: 'app-root',

templateUrl: './app.component.html',

styleUrls: ['./app.component.css']

})

export class **AppComponent** implements OnInit {

genders = ['male', 'female'];

**signupForm**: FormGroup;

**forbiddenUsernames** = ['Chris', 'Anna'];

constructor() {}

ngOnInit() {

this.signupForm = new FormGroup({

**'userData'**: new FormGroup({

'username': new **FormControl**(null, [**Validators**.**required**, this.**forbiddenNames**.**bind**(this)]),

'email': new **FormControl**(null, [Validators.**required**, Validators.**email**], this.**forbiddenEmails**)

}),

'gender': new **FormControl**('male'),

'hobbies': new **FormArray**([])

});

// this.signupForm.valueChanges.**subscribe**(

// (value) => console.log(value)

// );

this.signupForm.statusChanges.**subscribe**(

(status) => console.log(status)

);

this.signupForm.**setValue**({

'userData': {

'username': 'Max',

'email': 'max@test.com'},

'gender': 'male',

'hobbies': []

});

this.signupForm.**patchValue**({

'userData': {

'username': 'Anna',} }); }

onSubmit() {

console.log(this.signupForm);

this.signupForm.reset(); }

**onAddHobby**() {

const control = new **FormControl**(null, Validators.required);

(<FormArray>this.signupForm.get('hobbies')).push(control);

}

forbiddenNames(control: FormControl): {[s: string]: boolean} {

if (this.**forbiddenUsernames**.indexOf(control.value) !== -1) {

return {'nameIsForbidden': true};

} return null;}

forbiddenEmails(**control**: FormControl): **Promise**<any> | **Observable**<any> {

const promise = new Promise<any>((resolve, reject) => {

setTimeout(() => {

if (control.value === 'test@test.com') {

resolve({'emailIsForbidden': true});

} else { resolve(null);}, 1500);

});return promise; }}

<div class="container">

<div class="row">

<div class="col-xs-12 col-sm-10 col-md-8 col-sm-offset-1 col-md-offset-2">

<**form** [**formGroup**]="**signupForm**" (**ngSubmit**)="**onSubmit**()">

<div **formGroupName**="**userData**">

<div class="form-group">

<label for="username">Username</label>

<input type="text" id="username"

**formControlName**="username" class="form-control">

<span\***ngIf**="!**signupForm**.get('userData.username').valid && signupForm.get('userData.username').**touched**" class="help-block">

<span \*ngIf="**signupForm**.get('userData.username').errors['nameIsForbidden']">This name is invalid!</span>

<span \*ngIf="signupForm.get('userData.username').errors['required']">This field is required!</span>

</span>

</div>

<div class="form-group">

<label for="email">email</label>

<input type="text" id="email" formControlName="email" class="form-control">

<span \*ngIf="!**signupForm.get**('userData.email').**valid** && **signupForm**.**get**('userData.email').**touched**" class="help-block">Please enter a valid email!</span>

</div>

</div>

<div class="radio" \***ngFor**="let gender of genders">

<label>

<input type="radio" **formControlName**="gender"

[value]="gender">{{ gender }}</label>

</div>

<div formArrayName="hobbies">

<h4>Your Hobbies</h4>

<button class="btn btn-default" type="button"

(click)="**onAddHobby**()">Add Hobby</button>

<div class="form-group" \***ngFor**="let **hobbyControl** of signupForm.get('hobbies').controls; let i = index">

<input type="text" class="form-control" [**formControlName**]="i">

</div>

</div>

<span \*ngIf="!**signupForm**.valid && **signupForm**.touched"

class="help-block">Please enter valid data!</span>

<button class="btn btn-primary" type="submit">Submit</button>

</form>

</div>

</div>

</div>