

# Take home Assignment

## Take Home Assignment

You should supply the code for review and be ready to reference for the follow-up technical interview and be ready to demo their code via Screen Share. The purpose of this assignment is to provide us a sample of your code and architecture approach. It should be representative of what you would do as a professional level. It should be representative of what you would do as a professional during your day to day on the job. Please take the time to review the grading criteria below.

### How will I be graded?

- Code is clean, well-written and easy to read.
- Functionally works and satisfies the requirements below.
- UX/UI, Thoughtful design and user experience considered.
- Code is Unit/UI tested.
- Code reusability and scalability
- Feel free to show off your coding abilities in any appropriate way!

### Take Home Assignment - A Simple App (iOS Native)

For this assignment, you will build a simple app that includes a Detail Page and a List Page from the supplied API below. It should detail enough information on the List Page so that your users have critical high-level information on the items in the list, while the Detail Page should provide as much information as you think your users could want (be as complete as possible) presented in a way that makes the information easily digestible.

### Instructions:

1. Build a list page that displays high level data from an external public API
2. List page should have pagination
3. Build a detail page that displays detailed information about the selected item from the list page.
  - a. Transition to detail page should happen on list page item click.
4. Your code must be Unit/UI tested
5. Please consider also component structure and standards, performance and stability, etc.
6. SwiftUI must be used as the native development framework for this assignment.
  - a. UIKit submission will not be accepted.
7. Please use MVVM as the preferred architectural pattern
8. Feel free to show off your coding ability by adding any level of appropriate complexity.
9. Include a README that details information about your project, dependencies, setup, and requirements.

### Submission

Your app should be able to run in simulators. Please zip the project folder and include a simple README on setting up dependencies if your solution requires it.

## API

Please use the API bellow for your submission, you can find details at the provided link:

<https://thecatapi.com/>

Example response:

```
1 {
2
3   "id": "0XYvRd7oD",
4
5   "width": 1204,
6
7   "height": 1445,
8
9   "url": "https://cdn2.thecatapi.com/images/0XYvRd7oD.jpg",
10
11  "breeds": [
12
13    {
14
15      "weight": {
16
17        "imperial": "7 - 10",
18
19        "metric": "3 - 5"
20
21      },
22
23      "id": "abys",
24
25      "name": "Abyssinian",
26
27      "temperament": "Active, Energetic, Independent, Intelligent, Gentle",
28
29      "origin": "Egypt",}
30
31  ]
32
33 }
34
35 "country_codes": "EG",
36
37 "country_code": "EG",
38
39 "life_span": "14 - 15",
40
41 "wikipedia_url": "https://en.wikipedia.org/wi
```

**NOTE:** If you are not able to use the above API for some reason please leverage the following API instead:

<https://cataas.com>

Images for the JSON data can be found at [https://cataas.com/cat/\[\\_id\]](https://cataas.com/cat/[_id]).

Example response:

```
1 [
```

```
2
3 {
4
5   "_id": "rV1MVEh0Af2Bm400",
6
7   "tags": [
8
9     "kitten",
10
11    "several",
12
13    "gif"
14
15   ],
16
17   "owner": "null",
18
19   "createdAt": "Sun May 01 2022 20:57:11 GMT+0000 (Coordinated Universal
20
21   Time)",
22
23   "updatedAt": "Tue Oct 11 2022 07:52:32 GMT+0000 (Coordinated Universal
24
25   Time)"
26
27 },
28
29 {
30
31   "_id": "ZhrXPVRJniYPR6pp",
32
33   "tags": [
34
35     "gif"
36
37   ],
38
39   "owner": "null",
40
41   "createdAt": "Wed Jun 01 2022 22:29:22 GMT+0000 (Coordinated Universal
42
43   Time)",
44
45   "updatedAt": "Tue Oct 11 2022 07:52:32 GMT+0000 (Coordinated Universal
46
47   Time)"
48
49 },
50
51 {
52
53   "_id": "2VgBUv9MaBwk5qnK",
54
55   "tags": [
56
57     "manspreading"
58
59   ],
```

```
60
61 "owner": "null",
62
63 "createdAt": "Mon Oct 03 2022 07:59:01 GMT+0000 (Coordinated Universal
64
65 Time)",
66
67 "updatedAt": "Tue Oct 11 2022 07:52:32 GMT+0000 (Coordinated Universal
68
69 Time)"
70
71 },
72
73 {
74
75 "_id": "2bPYDRuvU70sbgja",
76
77 "tags": [
78
79 "closed eyes",
80
81 "sleepy",
82
83 "bed"
84
85 ],
86
87 "owner": "LeBonk", "createdAt": "Sun Sep 11 2022 00:27:05 GMT+0000 (Coordinated Universal
88
89 Time)",
90
91 "updatedAt": "Tue Oct 11 2022 07:52:32 GMT+0000 (Coordinated Universal
92
93 Time)"
94
95 },
96
97 {
98
99 "_id": "AYJNTBAktmH3Q7ka",
100
101 "tags": [
102
103 "gif"
104
105 ],
106
107 "owner": "null",
108
109 "createdAt": "Sun May 01 2022 20:54:14 GMT+0000 (Coordinated Universal
110
111 Time)",
112
113 "updatedAt": "Tue Oct 11 2022 07:52:32 GMT+0000 (Coordinated Universal
114
115 Time)"
116
117 },
```

```
118
119 {
120
121   "_id": "LTxlBUdATocntNid",
122
123   "tags": [
124
125   ],
126
127   "owner": "null",
128
129   "createdAt": "Thu Jun 30 2022 06:05:15 GMT+0000 (Coordinated Universal
130
131   Time)",
132
133   "updatedAt": "Tue Oct 11 2022 07:52:32 GMT+0000 (Coordinated Universal
134
135   Time)"
136
137 },
138
139 {
140
141   "_id": "MBpd0f7cDU5EwhZ9",
142
143   "tags": [
144
145     "tuxedo",
146
147     "vending machine",
148
149     "stuck",
150
151     "glass",
152
153     "trapped"
154
155   ],
156
157   "owner": "LeBonk",
158
159   "createdAt": "Sun Sep 11 2022 00:25:56 GMT+0000 (Coordinated Universal
160
161   Time)",
162
163   "updatedAt": "Tue Oct 11 2022 07:52:32 GMT+0000 (Coordinated Universal
164
165   Time)"
166
167 },
168
169 {
170
171   "_id": "MkRxexGVMQzEoN73",
172
173   "tags": [
174
175   ],
```

```
176
177 "owner": "null",
178
179 "createdAt": "Wed May 18 2022 07:06:08 GMT+0000 (Coordinated Universal
180
181 Time)",
182
183 "updatedAt": "Tue Oct 11 2022 07:52:32 GMT+0000 (Coordinated Universal
184
185 Time)"
186
187 },
188
189 {
190
191 "_id": "N6pTLrClzF83df8t",
192
193 "tags": [
194
195 "norwegian forest cat", "daisy",
196
197 "gaming",
198
199 "pc"
200
201 ],
202
203 "owner": "LeBonk",
204
205 "createdAt": "Sun Sep 11 2022 00:30:31 GMT+0000 (Coordinated Universal
206
207 Time)",
208
209 "updatedAt": "Tue Oct 11 2022 07:52:32 GMT+0000 (Coordinated Universal
210
211 Time)"
212
213 },
214
215 {
216
217 "_id": "Rn6xqsiHb9B7qgLw",
218
219 "tags": [
220
221 "small cat",
222
223 "brazilian",
224
225 "brazilian cat",
226
227 "brasileira",
228
229 "female cat",
230
231 "female",
232
233 "black & white",
```

```
234
235 "donna",
236
237 "londrinense",
238
239 "londrina",
240
241 "cute cat",
242
243 "cute"
244
245 ],
246
247 "owner":"ricardo.ricardo815",
248
249 "createdAt":"Wed Sep 28 2022 02:36:22 GMT+0000 (Coordinated Universal
250
251 Time)",
252
253 "updatedAt":"Tue Oct 11 2022 07:52:32 GMT+0000 (Coordinated Universal
254
255 Time)"
256
257 }
258
259 ]
```