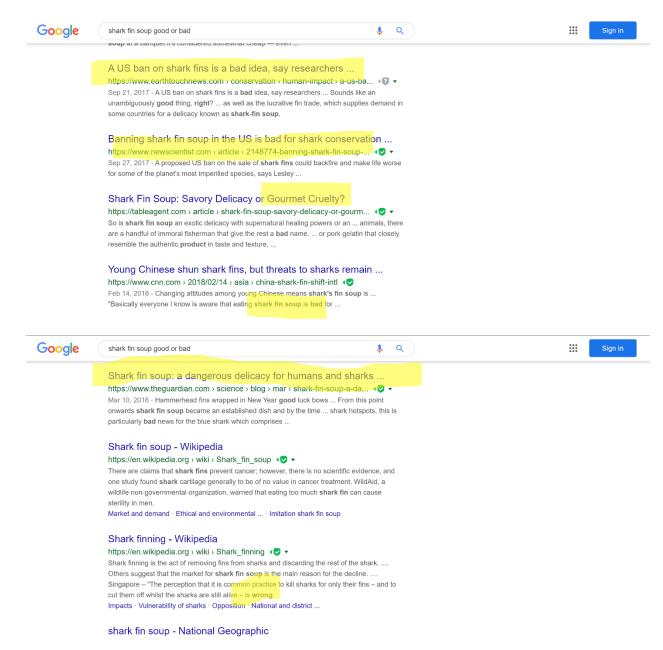
Q1:

- 1. The information that I want to gain is whether shark fin soup is a good or bad thing.
- 2. The keywords I used are: shark fin soup good or bad

3.



Looking at the screenshots above, it is clear that some results are contradicting other results. For example, if we look at the first screenshot, at the top, highlighted in yellow, is a result that mentions that researchers are saying that imposing a ban on shark fin is a bad idea. The result directly underneath that result says something similar; however, in another result within the same page (the second screenshot), it says that shark fin soup is a dangerous delicacy for humans and sharks, which implies that shark fin soup is bad. So, looking at the results, it isn't

clear whether shark fin soup is a good or bad thing; some results say it is good while others say it is bad.

4. What you can learn from doing this experiment is that not all questions or search queries when searching the question on Google, have clear answers; in other words, not all questions that are searched on Google or any other search engine, can produce a uniform set of results, in the case of my experiment, with all results pointing to yes or all results pointing to no.

An example of this is controversial topics like shark fin soup. Due to the debatable nature of controversial topics, there are no clear answers as to whether something is correct or incorrect, as there are arguments that support both sides of the topic. Together with the two sides of the argument published separately, when a search engine, Google, fetches these results, both sides of the argument are fetched, resulting in contradicting results.

Q2:

1. Results for Pika

ITEM	CATEGORY
Pika Plush Toys 6 Stuffed Pika, Kids Stuffed	Toys
Animals	
Pikas (Wild Animals Series Book 5)	Books
Indica Plateau Mens Pika T-Shirt	Clothes and accessories
Pika Karambit Black	Hunting knives
Pika Pika Fantajin (Vinyl)	CD and Vinyl records
Pika-Don	CD and Vinyl records
Pika Men Women Adjustable Dad Hat	Clothes and accessories
Baseball Caps Sandwich Hat Trucker Hats	
3D Lamps Decorative LED Optical Illusions 7	Night lights
Colors Change Touch Neon Switch Night Light	
for Lamp Children Table	
Indica Plateau Youth Pika Kids T-Shirt	Clothes and accessories
Indica Plateau Pika Unisex Adult Hoodie	Clothes and accessories
UCO Pika 150 Lumen Rechargeable LED	Flashlights
Lantern with Flashlight USB Charger	
Sailor Moon Eternal Edition T01 : Pretty	Books
Guardian (Pika Shôjo) (French Edition)	
Pikas Metamorphosis	CD and Vinyl records
Pika 1 Piece Luggage Bag Travel Tags	Travel Accessories
2.2inch×3.7inch	
Yocaher Punked Complete Skateboards 7.75"	Skateboards
or Mini Cruiser or Micro Cruiser Shapes -	
Pika, Candy, and Chimp Series	
Pokemon Leaping Pikachu 16" Backpack	Bags and backpacks
Indica Plateau Youth Pika Kids Hoodie	Clothes and accessories
Small Titles of Great Masters	CD and Vinyl records
MSR Pika Camping Teapot	Camping Equipment

Dutch Oven Cookout, Step-by-Step	Books
Buckle Down unisex-adult Buckle-Down Web	Clothes and accessories
Belt Pokemon 1.5" Belt	
LQT Ltd Poke-mon Foil Balloons Inflatable	Party Supplies
Toys Pika-chu Helium Balloon Kids Toys	, , , , ,
Happy Birthday Balloons Party Supplies	
10pcs/lot	
Pika Pika Luxury 3D Plush Fronted Pikachu	Bags and backpacks
Backpack School Bag	
Pika with Grass in The Mouth Travel	Umbrellas
Umbrella, Automatic Folding Umbrella,	
Compact 42.5 Inch Rain Umbrella for Men	
Women, Auto Open Close	
The Pika and the Pink Mountain	Books
Buckle Down mens standard Buckle-down	Clothes and Accessories
Web Belt Pokemon 1.25"	
Pika - Waltz [Japan CD] TOPD-186	CD and Vinyl records
Pokémon, Choose Pika 16-Inch Applique Big	Bed accessories and supplies
Face Character Pillow and 40" x 50" Fleece	
Throw in Pocket Set, Multi Color	
Dreamland T19 : Anus (French Edition)	Books
Pika Laptop Bag School Travel Backpack	Bags and backpacks
CARD CAPTOR SAKURA T11	Books
Pokemon Pika! Front Flap Jrs. Wallet	Wallets
Pokemon Big Pika Twin/Full Comforter with 2	Bed accessories and supplies
Pillow Shams by The Northwest Company	
Lagomorphs: Pikas, Rabbits, and Hares of the	Books
World	
Lynn (Vinyl)	CD and Vinyl records
Night Light 3D, Night Light Game Action	Night lights
Figure 3D Led Lamp Baby Table Lamp 7 Color	
Kid Toy Home Decor Xmas Birthday Gift	
Pika Vintage Starry Sky Backpacks Casual	Bags and backpacks
Daypack Bags	
Buckle Down Men's Web Belt Pokemon 1.25"	Clothes and accessories
Twisty Petz Series 3 3-Pack, Pika Panda,	Toys
Bracelet Set	
Sister and Vampire T04 (French Edition)	Books
LOVE HINA T01	Books
Pika Pika Fantajin by Kyary Pamyu Pamyu	CD and Vinyl records
(2014-08-19)	
22" Foldable Large Travel Duffel Duffle Bag	Bags and backpacks
Overnight Carryon Weekend Bag Shoulder	
Bag Water Rresistant 8 Color Choices (Pika)	
Indica Plateau Womens Pika Blank V-Neck T-	Clothes and accessories
Shirt	

leegoal Poke Ball Protective Case, Portable	Nintendo Switch cases
Carrying Case Accessory Bag for Pokémon	
Lets Go Pika-chu Eevee (Not Included Poke	
Ball)	
HHenry Cute Poke-mon Pika-chu Cotton	Bed accessories and supplies
Pillow Throw Cushion Cover Case 18 * 18 Inch	
Home Decoration	
Winterial Pika Kids Snowshoes, Youth Flat	Snowshoes
Terrain Snow-Shoe, Blue	
Ah! My Goddess T41 (French Edition)	Books

17 categories were created based on the expected use case of the item and keywords that users may search when looking for these items.

CATEGORY	INFORMATION NEED
Books	I would like to read a book on pika.
Flashlights	I would like to find the pika flashlight.
Snowshoes	I would like to find pika snowshoes.
Bed accessories and supplies	I would like to find bed accessories that have pika on it.
Nintendo Switch cases	I would like to find a case for my pika game on Nintendo Switch.
Clothes and accessories	I would like to find clothes and accessories with pika on it.
Bags and backpacks	I would like to find bags and backpacks with pika branding.
CD and vinyl records	I would like to listen to CDs and vinyl records with pika in the name.
Toys	I would like to find pika toys.
Night lights	I would like to find a pika night light.
Wallets	I would like to find a pika wallet.
Umbrella	I would like to find an umbrella with pika on
	it.
Party Supplies	I want to find pika related party supplies.
Camping equipment	I would like to find a pika camping accessory.
Skateboards	I want to find a skateboard with pika on it.
Travel Accessories	I want to find a travel accessory that has a pika branding on it.
Hunting knives	I would like to find a pika hunting knife.

2. Results for **Ditto**

ITEM	CATEGORY
Donner Dp-1 Guitar Pedal Power Supply 10 Isolated DC Output for 9V/12V/18V Effect	Guitar Loopers and samplers
Pedal	

TC Electronic Guitar Ditto Looper Effects Pedal	Guitar Loopers and samplers
2 in 1 Poketoy Exclusives Snorlax 13" Plush Doll	Toys and games
TC Electronics Ditto X2 Looper	Guitar Loopers and samplers
TC Electronic Ditto Stereo Looper, Gray	Guitar Loopers and samplers
Ditto Wearable Tech for Smartphones - Clear	Guitar Loopers and samplers
TC Electronic Ditto X4 Looper	Guitar Loopers and samplers
TC Electronics Ditto Mic Looper Pedal	Guitar Loopers and samplers
TC Electronic Guitar Looper Effects Pedal	Guitar Loopers and samplers
(960841001)	
Ditto Earphone Case, Portable Earbud Storage	Headphone cases
Pouch Carrying Case with Carabiner for	
Earpods MP3 Wired/Wireless Headset	
Headphone SD TF Card and USB Cables -2	
Pack, Black	
Skechers Womens Parallel - Ditto -	Shoes
Asymmetrical Collar Suede Bootie Ankle Boot Donner Tiny Looper Guitar Effect Pedal 10	Guitar Loopers and samplers
minutes of Looping 3 Modes	Guitai Loopers and samplers
Ditto Electronics Organizer Travel Bag, Small	Bags
Electronics Accessories Cable Carrying Case	5083
Roll Up Pouch for Hard Drives Cables Charger	
SD Memory Cards Earphone Pen -Black	
Pokémon Ditto Plush Stuffed Animal Toy -	Toys and games
Large 8" - Ages 2+	
Pokémon Ditto Pikachu Plush Stuffed Animal	Toys and games
Toy - 8"	
Pokemon Card Detective Pikachu Ditto 17/18	Collectables
Holo Rare	
Pokemon Center Original Pokemon Fit Ditto	Toys and games
Métamorph Ditto Plush Peluche Plüschtier	Cuitan Assassarias
DIAL A NOTE • DIAL HARMONY • DIAL MUSIC THEORY	Guitar Accessories
Sonicake Multi Guitar Effect Strip Pedal	Guitar Loopers and samplers
Sonicbar Rockstage Combining 4 Classic Arena	Guitai Loopers and samplers
Rock Guitar Effects in 1 Unit of Chorus	
JOYO JF-17 Guitar Extreme Metal Amplifier	Guitar Loopers and samplers
Effect Pedal True Bypass	,
Sonicake Multi Guitar Effect Pedal Strip	Guitar Loopers and samplers
Sonicbar Twiggy Blues Combined Stage 4 in 1	
Effect Compressor, Overdrive, Delay and	
reverb effect Pedal	
B-RAY 20 Styles Plush Toy 12-18cm Peluche	Toys and games
Pikachu Snorlax Charmander Mewtwo	
Dragonite Cute Soft Stuffed Dolls for Kids (Q	
Ditto)	
Beth Ditto vinyl record wall clock, Beth Ditto	Clocks
Gift For Every Occasion	

Ditto Leather Wallet Case for iPhone XR,	Phone cases
Genuine Leather Flip Case for Apple iPhone XR	
6.1 Inch 2018 with Magnetic Closure Card	
Holders Kickstand (Black)	
Planet Waves 9V Power Adapter - PW-CT-9V	Power supplies
TOMY T19117 Pokémon Thow N Pop Poké Ball,	Toys and games
Ditto Action Figure	, ,
Nux Loop Core Guitar Effect Pedal Looper 6	Guitar Loopers
Hours Recording Time, 99 User Memories,	·
Drum Patterns with Tap Tempo	
Metier Life Watch Roll for Travel Storage -	Bags
Canvas and Soft Vegan Suede with 4 Organizer	
Pockets (Grey/Blue)	
9V AC/DC Power Adapter for	Power supplies
BOSS, Dunlop, Dan Electro, Digi Tech, Ditto, Electro	
Harmonix,TC Electronic,Zoom Guitar Multi	
Effects pedal, Casio Piano Keyboard by	
LotFancy, Center Negative Connector, UL Listed	
Talking Robots for Kids Ditto Mini Robot Travel	Toys and games
Toy with Posable Body, Smart Educational	
Stem Toys, Voice Changer and Robotics	
Educational Gift Robotics for Kids	
Juras SMART Claris Espresso Machine Filter -	Coffee Filters
Box of 3	
LQT Ltd Stuffed Animals Pikachu with Ditto	Toys and games
Plush Toy Dolls Kawaii Pikachu Stuffed Dolls	
11" 27 cm Children Gift	
3D Rose"Blackbellied Whistling Duck South	Mouse Pads
Texas UsaUs44 Ldi0755Larry Ditto" Matte	
Finish Mouse Pad - 8 x 8" - mp_146880_1	
Boss RC-1 Loop Station	Guitar Loopers and samplers
Takaratomy Pokemon Sun & Moon-ESP-19-	Toys and games
Ditto & Pikachu (Ditto Face) Figure	
Loungefly x Pokemon Ditto Crossbody Bag	Bags
Double Ditto Family Party Board Game (New	Toys and games
for 2015)	
Tinkerine Ditto Pro 3D Printer, 50-300microns	3D Printers
Layer Resolution	
TC Electronic Ditto Jam X2 Looper Effects Pedal	Guitar Loopers and samplers
w/Polish Cloth and 4 Cables	
Toy Robots for Boys or Girls - Ditto Mini	Toys and games
Talking Robots for Kids w/ Posable Body,	
Bright LED Toys Interactive Voice Changer	
Robot Travel Toys (Green)	
MyVolts 9V Power Supply Adaptor Compatible	Guitar Loopers and samplers
with TC Electronic Ditto Looper Effect Pedal -	
US Plug	
	<u> </u>

Pokemon TCG Lost Thunder Ditto Prism Star	Collectables
154/214	
TC Electronic Ditto Looper X4 Looper Pedal	Guitar Loopers and samplers
with 1 Year Free Extended Warranty	
RED SHIELD 3-in-1 Mini Precision Screwdriver	Tools
Set for Eyeglasses, Sunglasses, Jewelry, and	
Watch Repair	
12CM-16CM Ppeluche DDITTO Lapras	Toys and games
Ddragonite Ppikachu Ssquirtle Bbulbasaur	
Charmander Plush Doll Toys	
Stuffed & Plush Animals - Pocket Plush Jirachi	Toys and games
Jigglypuff Torchic Togepi Poliwhirl Cubone	
Totodile Ditto Treecko Snivy Stuffed Animal	
Dolls Toys - by ZANAN - 1 PCs	
Mmurong Plush Toy, Animal Filled, Soft, Cloud-	Toys and games
Like Soft, Child Comfort, Sleep hug30CM Ditto	
Metamon Snorlax Inside-Out Cushion Japan	
Plush Doll Figure Toys	
APC 6-Outlet Wall Surge Protector 1080 Joules,	Surge Protectors
SurgeArrest Essential (P6W)	
CiaraQ DIY Colored Clay, 24 Colors DIY Creative	Craft Supplies
Street Model Clay, Soft Molded Oven Baking	
Clay and Tutorial. Best gift for Children	
Pokemon Center original mascot replying!	Toys and games
Ditto gnolomo	
ammoon Twin Looper Aluminum Alloy Guitar	Guitar Loopers and samplers
Effect Pedal Mono Stereo Input/Output Sound	
Recording USB Cable	
Ditto Wearable Tech for Smartphones - White	Smart Accessories

16 categories were created again, based on the expected use case of the item and keywords that users may search when looking for these items.

CATEGORY	INFORMATION NEED
Power supplies	I would like to find power supplies for my
	ditto branded guitar looper.
Guitar Loopers and samplers	I would like to find ditto branded guitar
	loopers and samplers.
Toys and games	I would like to find ditto toys and games.
Smart accessories	I would like to find ditto branded smart
	accessories.
Collectables	I would like to find collectable ditto trading
	cards.
Headphone cases	I would like to find ditto branded headphone
	cases for my headphones.

Chaos	Lwould like to find a pair of chaos called
Shoes	I would like to find a pair of shoes called
	ditto.
Clocks	I would like to find a ditto wall clock.
Phone cases	I would like to find a ditto branded phone
	case.
Bags	I would like to find ditto branded bags.
Coffee filters	I would like to find coffee filters sold by a
	seller called ditto.
Mouse pads	I want to find mouse pads with dittos on it.
Tools	I would like to find tools to fix my ditto guitar
	loopers.
Surge protectors	I want to find a surge protector to protect my
	ditto guitar loopers.
3D printers	I want to find the ditto 3D printer.
Craft supplies	I want to find craft supplies that have colours
	of ditto.

If we know that within a 5-minute period, 10% of the customers are querying "pika" and "ditto", then we can predict that in the near future, a good percentage of the customers will be issuing these queries as well.

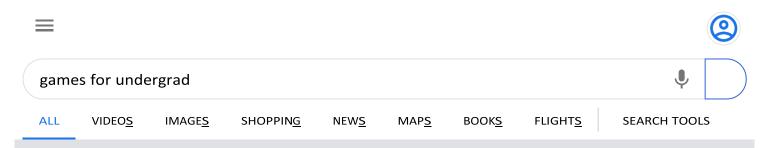
As a result, to improve the customer experience, Amazon could use the data recorded on previous customers issuing these queries, particularly the data on the products that these customers purchased or viewed, to create suggestions for future potential customers.

By using this data, one thing Amazon can do is whenever a user queries "pika" and "ditto", to put the corresponding most viewed and/or purchased items at the top of the results. This will improve user experience because what others have looked at and/or purchased, is more likely to be what another user wants, at least when compared to products that has not been looked at or purchased; as a result, if a potential customer is looking for the same products that others have looked at or purchased, then this potential customer can easily find the product they want at the top of the page, reducing the time it takes for them to find the item they want, improving customer experience.

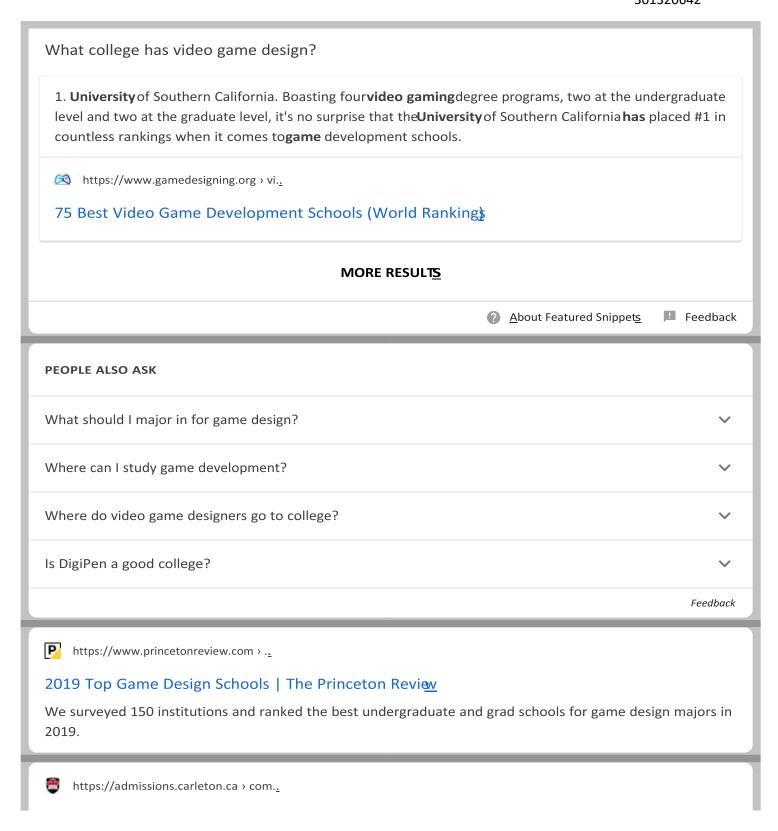
This can also be extended onto the main page, where Amazon could put the most purchased "pika" and "ditto" items on the main page under "Trending" products. By doing so, this will further reduce the time a user needs to spend searching because items will already be in front of their eyes.

Q3:

1. The first page of the results is as shown below



Did you mean: games for *undergradua*<u>e</u>



Computer Game Development - Undergraduate Admissions ...

Computer game development has become a sophisticated subject, drawing on advanced knowledge in a number of ...

https://brocku.ca > undergrad > game

2019-2020 Undergraduate Calendar - Game - Brock University

Jun. 18, 2019 · 2019-2020 Undergraduate Calendar ... Computer and video games can be complex expressive, ...

https://www.gamedesigning.org > vi.

75 Best Video Game Development Schools (World Ranking)

This includes both graduate and undergraduate degrees. (Recommended Washington game development programs) ...

https://www.wlu.ca > undergraduate

Game Design and Development (BFAA) | Wilfrid Laurier Universit

Want to change the world through games? Our Game Design and Development program will help you develop the tools ...

https://www.cs.usc.edu > undergra<u>d</u>

Computer Science (Games) - USC Viterbi | Department of Computer ...

The undergraduate program in computer science is an interdisciplinary program leading to the Bachelor of Science in ...

https://www.mun.ca > programs > vi.

Computer Science (Visual Computing and Gaming) | Undergraduate ...

Mar. 15, 2019 · The visual computing and games major studies how to use computers to both mimic human visual ...

calendar.athabascau.ca > program

Bachelor of Science Game Programming Minor: Undergraduate...

Sep. 1, 2017 · Undergraduate Programs. Undergraduate Game Programming Minor – Specific Requirements.

https://csgames.org > corpo > overvi.

The Event - CS Games | Social Computing Competition | Overview

In fact, the first ten pages of retrieved results are all related to schools and undergraduate programs teaching game design. For example, the first result is the top game design schools in 2019 by Princeton Review, the second result is the Computer Game Development program at Carleton University, and the rest of the results being similar.

2. When a user searches "games for undergrad" they are most likely looking for games that undergraduates would play; and within games, the searcher could mean video games, mind twisting games, or sporting games like basketball games, baseball games, etc.

However, regardless of the type of game, all Google returns are pages and pages of school programs that teach game design. As a result, Google does not address the information needs of the searcher.