Scalable Extraction of Training Data from (Production) Language Models

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Abstract

This paper studies *extractable memorization*: training data that an adversary can efficiently extract by querying a machine learning model without prior knowledge of the training dataset. We show an adversary can extract gigabytes of training data from open-source language models like Pythia or GPT-Neo, semi-open models like LLaMA or Falcon, and closed models like ChatGPT. Existing techniques from the literature suffice to attack unaligned models; in order to attack the aligned ChatGPT, we develop a new *divergence* attack that causes the model to diverge from its chatbot-style generations and emit training data at a rate 150× higher than when behaving properly. Our methods show practical attacks can recover far more data than previously thought, and reveal that current alignment techniques do not eliminate memorization.

1 Introduction

Large language models (LLMs) memorize examples from their training datasets, which can allow an attacker to extract (potentially private) information [7, 12, 14]. Prior work has (a) performed large-scale studies of the total quantity of memorized training data for open-source models [11], and (b) developed practical attacks to extract training data on (relatively) small models like GPT-2, by manually annotating examples as memorized or not [14].

In this paper, we unify these two directions and perform a large-scale study of "extractable memorization" in language models. Unlike *discoverable* memorization [11] that captures an upper bound on *all* training data that is memorized (even if it can only be recovered by prompting the model with other training data), *extractable* memorization captures only that data that can be efficiently recovered by an adversary. We develop a scalable methodology that allows us to detect memorization in trillions of tokens of model outputs in terabyte-sized datasets, and perform this analysis on both open-source models (e.g., Pythia [5], GPT-Neo [6]) and semi-open models (e.g., LLaMA [49], Falcon [40]). We find that larger and more capable models are more vulnerable to data extraction attacks.

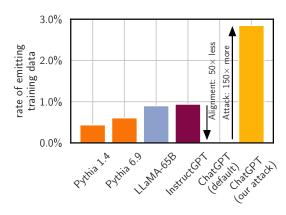


Figure 1: We scalably test for memorization in large language models. Models emit more memorized training data as they get larger. The aligned ChatGPT (gpt-3.5-turbo) *appears* $50\times$ more private than any prior model, but we develop an attack that shows it is not. Using our attack, ChatGPT emits training data $150\times$ more frequently than with prior attacks, and $3\times$ more frequently than the base model.

But when we perform this analysis on gpt-3.5-turbo, it appears to memorize almost no training data. We hypothesize that this is because ChatGPT has been *aligned* (with RLHF [35, 37, 39, 44]) to act as a helpful chat assistant.¹

To circumvent the model's alignment, we discover a prompting strategy that causes gpt-3.5-turbo to "diverge" from reasonable, chatbot-style generations, and to behave like a base language model, outputting text in a typical Internet-text style. In order to check whether this emitted text was previously contained somewhere on the Internet, we merge together several publicly available web-scale training sets into a nine terabyte dataset. By matching against this dataset, we recover over ten thousand examples from ChatGPT's training dataset at a query cost of \$200 USD—and our scaling estimate suggests that one could extract over $10 \times$ more data with more queries.

¹While limited information is available about this model, similar models like GPT-4 have been trained to "refuse to answer certain types of requests," including those related to training data extraction [37, p. 13].

Ethics & Responsible Disclosure. We have taken great care to responsibly share our findings. We shared our findings with the authors of each model we study in this paper (e.g., OPT [54], Falcon [40], Mistral [28], and LLaMA [49]),.

Our attack on ChatGPT (gpt-3.5-turbo) is specific to this model and, to the best of our knowledge, is not applicable to any other production language model that we have tested. We disclosed this vulnerability to OpenAI on August 30th (after discovering the flaw on July 11th), and allowed 90 days for the issue to be addressed following standard disclosure timelines [41] before publishing this paper.

We believe it is now safe to share this finding, and that publishing it openly brings necessary, greater attention to the data security and alignment challenges of generative AI models.² Our paper helps to warn practitioners that they should not train and deploy LLMs for any privacy-sensitive applications without extreme safeguards.

2 Background and Related Work

Training data for language models. State-of-the-art large language models (LLMs) are pre-trained on vast text corpora that consist of billions to trillions of tokens [6, 42, 43, 50]. For proprietary models such as GPT-4 [38] and PaLM 2 [2], these training sets are kept secret to presumably hide (1) the company's proprietary data collection pipeline, and (2) any private, user-specific, or licensed training data that is not publicly available [31, 32].

Instruction-tuning and RLHF. Pre-trained LLMs can solve numerous downstream tasks by conditioning on natural language instructions [8]. The model's utility can be drastically improved via supervised fine-tuning or RLHF on instruction-following data [3, 18, 36, 38, 39, 44]. Aside from utility, this "alignment" stage can also train models to use a unified chat-like persona [35, 39] and to abstain from answering on certain types of queries (e.g., it will not assist users in writing spam emails) [37]. In this work, we analyze ChatGPT (specifically, the gpt-3.5-turbo model endpoint).

Privacy attacks. Neural networks, especially ones with many parameters, can memorize their training data. This can be exploited by adversaries via membership inference attacks that infer whether an example was in the training set [9, 17, 21, 45, 52], as well as more powerful data extraction attacks [4, 12, 14, 30] that recover full training examples. In this work, we conduct both types of attacks on LLMs.

3 Extracting Data from Open Models

We begin by studying data extraction attacks on *open* models where both the models' parameters and their original training sets are publicly available. This lets us precisely evaluate the performance of extraction attacks from prior work.

3.1 Prior Approaches and Definitions

We follow the (conservative) definition of memorization of Carlini et al. (2021) [14]: given a model trained on a training set \mathbb{X} , we denote a string $\mathbf{x} \in \mathbb{X}$ as *memorized* if we can prompt the model's generation routine Gen to produce the string \mathbf{x} verbatim. Some prior work (e.g., [10, 11, 47]) has proposed more general notions of memorization where the model may generate a "close" copy of a training sample, but we restrict ourselves to verbatim matches as this will make it possible to scale our analysis to large datasets. This leads us to our definition of *extractable memorization*:³

Definition 1 (Extractable memorization). Given a model with a generation routine Gen, an example \mathbf{x} from the training set \mathbb{X} is extractably memorized if an adversary (without access to \mathbb{X}) can construct a prompt \mathbf{p} that makes the model produce \mathbf{x} (i.e., $\mathsf{Gen}(\mathbf{p}) = \mathbf{x}$).

The design and evaluation of extraction attacks in prior work were primarily hindered by two challenges:

- 1. How should we design prompts that best elicit memorization in a model?
- 2. How do we test whether the attack worked, i.e., whether the model's output is training data or not?

Prior work has tackled these challenges with various heuristics. For example, Carlini et al. (2021) [14] recover training examples from the GPT-2 language model [42] by prompting it with short strings sampled from the public Internet, and then manually checking whether these strings can also be found with a Google search. That is, they address the first challenge by simply prompting the model with data sampled from the model's training distribution (GPT-2 was trained on some unknown text sampled from the Internet), and they address the second challenge by (reasonably) assuming that any string memorized by the model is also contained in Google's search index; they manually query with output strings to see if they exist on the public Internet.

Their attack, while successful, only verifiably recovers $\approx 0.00001\%$ of GPT-2's training dataset. The authors acknowledge that this is likely a loose lower bound; they could not produce a tighter estimate due to the time-consuming manual verification procedure that their attack involves.

Rather than improving this loose lower bound, subsequent work has instead focused on measuring an *upper bound* on

²In fact, in early August, a month after we initial discovered this attack, multiple independent researchers discovered the underlying exploit used in our paper, but, like us initially, they did not realize that the model was regenerating training data, e.g., https://twitter.com/nostalgebraist/status/1686576041803096065.

³Prior work also uses the word "extractable" [14]; we supply a general definition that encompasses attacks in this work and our own.

the strength of an extraction attack, thereby circumventing the two challenges described above. Several works [11,27] have studied the extent to which models can regurgitate their training data when explicitly prompted with data from their training set. That is, given a training string $[p||x] \in \mathbb{X}$ that consists of a prefix p and suffix x, we can measure whether the model can generate x when prompted with the true prefix p. Following Carlini et al. (2022) [11], we denote this as discoverable memorization:

Definition 2 (**Discoverable memorization**). For a model Gen and an example [p||x] from the training set \mathbb{X} , we say that x is discoverably memorized if Gen(p) = x.

Prior work shows that many LLMs discoverably memorize roughly 1% of their training datasets (when prompting the model with about 50 tokens of context) [2, 11, 30]. There is thus a huge gap between prior lower bounds on extractable memorization (i.e., actual extraction attacks that have to be manually verified [14]), and upper bounds that assume full access to the training set \mathbb{X} . This raises a natural question: why is there such a large observed gap between extractable and discoverable memorization in the literature?

To answer this question, recall the differences between how prior work measured extractable and discoverable memorization rates: first, prompts are constructed by either heuristic means or by using the actual true prefix p, and second, verifying if data was successfully extracted was either performed manually or by looking at the actual training dataset X. This suggests two possible explanations for the observed gap:

- It is possible that prompting models with training data leads to orders-of-magnitude more training-data regurgitation, compared to realistic extraction attack strategies (in which adversaries do not have access to the training set).
- 2. Alternatively, perhaps existing extraction attacks already make models regurgitate large amounts of training data, but prior work was not able to *verify* that the model outputs were training data.

Our goal in this section is to disentangle these two possible explanations. As we will show, the latter explanation is (mostly) the correct one. Existing extraction attacks are actually a lot more successful at recovering training data than what prior work indicates.

3.2 Attack Methodology

To begin, we evaluate past extraction attacks in a controlled setting where testing for attack success is possible. That is, we first focus on open-source models with publicly available training datasets, where we can mechanistically verify if any generated output \boldsymbol{x} is indeed training data (but, crucially, the attack itself does not rely on knowledge of the training set).

We follow the data extraction attack method of Carlini *et al.* [14]: (1) we download 10^8 bytes of data from Wikipedia, and generate prompts \boldsymbol{p} by randomly sampling (with replacement) hundreds of millions of continuous 5-token blocks from this dataset; (2) we perform an independent generation for each prompt \boldsymbol{p}^i as $\text{Gen}(\boldsymbol{p}^i) = \boldsymbol{x}^i$ and store each \boldsymbol{x}^i .

Our methodology differs in how we evaluate the efficacy of the attack. Because this prior attack extracted training data from a language model without a public dataset, it was necessary to manually search the Internet in order to determine whether or not any generated sequence was contained in the model's training dataset. In contrast, each model we study in this section is fully open-source. This lets us directly query the model's training data to evaluate whether or not any generated sample is memorized.

Performing the training set inclusion test $\mathbf{x} \in \mathbb{X}$ naively is prohibitively expensive, as LLMs are trained on datasets with trillions of tokens and we generate billions of tokens of output from each of these models. To make this search efficient, we use a *suffix array*, as done in Lee et al. (2021) [33]—a data structure that stores all suffixes of the dataset in sorted order, and which enables fast string lookups (using binary search). We build a suffix array \mathbf{s} over \mathbb{X} , denoted $\mathbf{s}(\mathbb{X})$ or simply \mathbf{s} when unambiguous. We can then check that $\mathbf{x} \in \mathbf{s}$, which is equivalent to checking $\mathbf{x} \in \mathbb{X}$ (see Appendix A).

We report that an extraction is successful if the model outputs text that contains a substring of length at least 50 tokens that is contained verbatim in the training set.⁴ We chose this value empirically to be sufficiently large so that no two suffixes could accidentally overlap. We estimated the amount of token overlap between news articles guaranteed to be written after the creation of the largest training datasets RedPajama [19]. We found no overlap longer than 25 tokens, excluding direct quotations (i.e., actual copies). We then chose to be extremely conservative and double this value.

3.3 Empirical Results

We apply our attack to 9 open-source models of different sizes. Since these models were, e.g., "designed specifically to facilitate scientific research" [5], they make available their entire training and pipeline and dataset, facilitying our study.

- GPT-Neo (1.3B, 2.7B, 6B) [6], a family of models trained on The Pile [23].⁵
- Pythia (1.4B, 1.4B-dedup, 6.9B, 6.9B-dedup) [5], a family of models also trained on The Pile, but primarily designed for studying model scaling and memorization.
- RedPajama-INCITE (Base-3B-v1, Base-7B) [20], models trained on the *RedPajama* [19] dataset.

⁴We also require that the entropy of the generated string is high, to filter out degenerate examples such as repeated whitespace, or lists of numbers.

⁵The 6B paramter model is officially called GPT-J; for consistency and simplicity we refer to it as GPT-Neo 6B in this paper.

Model Paramily	arameters (billions)	% Tokens memorized	Unique 50-grams	Extrapolated 50-grams
RedPajama	a 3	0.772%	1,596,928	7,234,680
RedPajama	a 7	1.438%	2,899,995	11,329,930
GPT-Neo	1.3	0.160%	365,479	2,107,541
GPT-Neo	2.7	0.236%	444,948	2,603,064
GPT-Neo	6	0.220%	591,475	3,564,957
Pythia	1.4	0.453%	811,384	4,366,732
Pythia-ded	up 1.4	0.578%	837,582	4,147,688
Pythia	6.9	0.548%	1,281,172	6,762,021
Pythia-ded	up 6.9	0.596%	1,313,758	6,761,831

Table 1: For each model we generate 1 billion tokens and report: (1) the rate at which models generate 50-token sequences that occur in AUXDATASET; (2) the number of unique, memorized 50-token sequences; and (3) our extrapolated lower bound of unique, memorized 50-token sequences. Our lower bound is often exceptionally loose—for example in Figure 4 we extract over 30 million unique 50-token sequences from GPT-Neo 6B by generating 500× more data, nearly 10× the estimated lower bound.

We generate one billion tokens of output for each model and then compute the number of memorized examples by matching against the corresponding training set. From this data, we can perform two different types of analysis. First, in Table 1, we measure the *fraction of model outputs* that are memorized. We observe rates between 0.1% and 1%. But this number is hard to interpret—a model that emitted the same memorized training sequence thousands of times in a row would look highly non-private, even if in practice it was revealing almost no data.

And so instead, we can also compute the *number of unique* 50-token strings that we extract, which varies between several hundred thousand and several million. This allows us to observe data extraction rates orders of magnitude higher than reported previously in Carlini et al. (2021) [14, p. 13], which only verifiably extracted 600 sequences from GPT-2. This serves as evidence to suggest that extractable memorization rates are much higher than previously thought (at least for these open models). We observe a strong correlation between model size and *both* the rate of emitting memorized output and also the total number of unique 50-token sequences we extract, indicating that the pathological failure mode where a model repeatedly emits the same memorized example is not common in

3.4 Estimating Total Memorization

In our explorations thus far (Sections 3.3 and 3.5), we have used a large fixed budget of generations for our extraction attacks. But, the number of generations has a significant impact on the amount of extractable memorization, as can be clearly

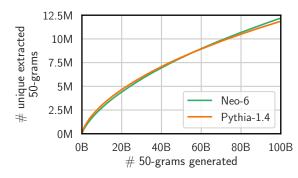


Figure 2: As we query models more, they emit more unique memorized data. This *rate* of extraction differs between models and can also change. For example, though Pythia-1.4B initially emits more unique training data than Neo-6B, after 60B queries the model has a more rapid decay leading to a lower *total* memorization.

seen from Figure 2: memorization grows (nearly) linearly even after generating several hundred billion tokens.

This leads to a natural question that has not yet been discussed in the literature: if we could query a model infinitely, how much memorization could we extract in total? Given this is infeasible, we instead aim to estimate the *total memorization*. However, again observing Figure 2 demonstrates a challenge here: the *rate* of extracting memorized training data is not a good predictor of the *total* quantity of memorization. In particular, we observe that at smaller compute budgets, Pythia 1.4B appears to memorize more data than the (larger) GPT-Neo 6B. However, if we query the model more, the rate of extractable memorization in Pythia-1.4B decreases, revealing that GPT-Neo 6B in fact memorizes more data in total. Thus, we will need to find better predictors of the total memorization of a model.

Extrapolating total memorization. We begin by decomposing our extrapolation problem into estimating two values: 1) how often a model outputs *anything* memorized, and 2) how often a memorized generation is *new*. The first value is not stateful and so can be easily estimated as a probability. But, the second value depends on how many memorized strings we have already observed. Let us focus on this latter quantity. Note that the total amount of memorization the model will ever output as we scale the number of generations, does not depend on the first value.

We can visualize the rate of new memorization via a slight modification of Figure 2. Instead of varying the *number of generated tokens*, we instead compute and vary the *number of memorized tokens extracted*. In this visualization, shown in Figure 3, we can more clearly observe the differences between GPT-Neo 6B and Pythia 1.4B. In particular, the slope and curvature of the plot help us understand the model's total memorization: Pythia-1.4 outputs new memorized examples

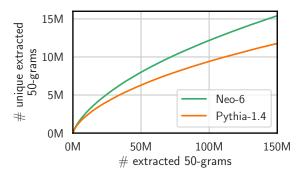


Figure 3: Number of unique extracted 50-grams versus the number of total extracted 50-grams (generated and memorized). The rate of observing unique 50-token sequences from GPT-Neo 6B always dominates the rate of observing unique 50-token sequences from Pythia-1.4B.

less frequently than GPT-Neo 6B, and seems to saturate much more quickly as well, pointing to the limit of how much training data we can surface. While the slope and curvature are only estimations, they can serve as a starting point to understand how to make extractable memorization more efficient. Indeed, they can enable us to estimate how much memorization could be extracted even if researchers do not have the capability to generate many hundreds of billions of tokens.

Intuition. Suppose a researcher wants to know how many fish live in a lake. If this researcher is very hardworking, they could try to count each fish individually, catching and then throwing them back in the lake, and hoping to not skip or double-count any fish. However, in practice, a common technique is known as mark-and-recapture [48]: first, catch and $mark\ N$ fish, wait for some time, and then $recapture\ K$ fish, recording the number L of fish that have been marked. From this information, mark-and-recapture estimates the number of fish in the lake as NK/L.

This estimate requires making a few assumptions. First, no one fish is more likely than another to be caught. Second, the population does not change. Ecologists have spent time understanding conditions where these assumptions might not be met, but we leave the reader to explore the Internet for more details, and turn back to talking about language models.

Mark-and-recapture does not apply. An initial attempt at applying mark and recapture to our analysis would have us estimating, instead of fish, the total number of unique memorized 50-grams extractable from the model. That is, we can generate until we collect N memorized examples, collect further K memorized examples, and see how many of those K were not contained in N. Unfortunately, this ends up significantly undercounting extractable memorization. The main reason mark-and-recapture does not apply well is the first assumption is violated—not all memorized strings are equally

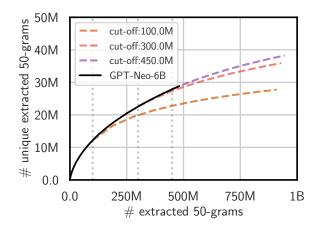


Figure 4: With sufficient data, a Good-Turing estimator can extrapolate the number of uniquely memorized examples. With too little data, it consistently underestimates this value.

likely to be output. In a fish pond, one can wait longer so the fish can swim around the pond, but we do not have any ways to fix this problem with language models! Inherently, some sequences are statistically more likely than others.

A better approach: sequential Good-Turing. Even when the distribution of extractable strings is unknown, we can still predict the probability that a fresh sample will yield a novel string using the work of Good and Turing [24]. Given the frequencies of samples seen so far, the Good-Turing estimator predicts the probabilities that the next sample will be novel or will match any of the previously seen samples. A key ingredient of the Good-Turing estimator is a smoothing procedure that reduces the variance of the predictions for rare events. We use the popular smoothing procedure in [22] because it has shown good empirical performance in many settings.

In order to make predictions beyond the next sample, we can sample an outcome according to the probabilities produced by Good-Turing and update our observed frequencies accordingly. Iterating this process gives us a Monte-Carlo simulation predicting the number of unique memorized examples potentially far into the future. An analysis of this sequential application of Good-Turing was carried out in [1].

The results of using the Good-Turing extrapolation are shown in Figure 4. We find that having sufficiently many observations is essential to produce a good extrapolation. We also observe that this approach underestimates the number of unique memorized examples by GPT-Neo 6B.

In the appendix, Table 15 compares various other methods for estimating the total quantity of memorized training under varying assumptions. We find that Good-Turing consistently gives higher quality lower bounds than other methods, such as Chao1 [15], Chiu *et al.* [16], and Zelterman [53].

3.5 Discoverable Mem. vs. Extractable Mem.

To understand what gap remains between extractable and discoverable memorization, we study two questions: How many data samples are memorized under both definitions? And more interestingly, how many samples are extractable but not discoverable or discoverable but not extractable?

Prior work released a dataset of discoverable memorizations from The Pile for the GPT-Neo 6B parameter model [11]. We compare these with the extractable memorized examples from the prior section. This results in the following confusion matrix, which compares sequences classified as discoverably and/or extractably memorized on GPT-Neo 6B.

Extractable	1799	618	
Extractable	Both	Extractable Only	
Not Extractable	3211	11019	
Not Extractable	Discoverable Only	Neither	
	Discoverable	Not Discoverable	

Most training data from the model is (unsurprisingly) not memorized under either definition. Then, 30.1% of examples are discoverably memorized and 14.5% are extractably memorized. But surprisingly, despite generating several hundred billion tokens, only 35% of the discoverably-memorized examples were also extractable. While this is orders of magnitude larger than had previously been believed [11], it is still not most (or even all) of the data that is known to be memorized. We also uncover an additional 11% memorized sequences via our extractable memorization attacks that were not discoverably memorized. We extend this analysis in Figure 19 which analyses sequences from the Pile that have a varying number of duplicates [11]. We computed the percent of those sequences that were memorized—either discoverably or extractably memorized. We see that highly duplicated sequences are also both easier to extract and discover.

We make four observations from this data. First, it is somewhat surprising that a simple attack that just samples from the model is sufficient to recover a large fraction (35%) of all (known) memorized training data. Second, it also suggests that there is still room for improving current extraction attacks. Third, measuring discoverable memorization is a useful and reasonably tight characterization of data that can actually be extracted by an adversary. And fourth, our work highlights there is also room to improve discoverable memorization baselines: though sampling prefixes from the training set have high likelihood of discovering memorization, there still exist data that is (extractably) memorized (by prompting with random strings) but not discovered in this way. We suspect this is caused because sequences were reported to be discoverably memorized only if greedy decoding resulted in reconstructing the training example [11].

4 Extracting Data from Semi-closed Models

By focusing on open-source models, our results of the previous section let us show that there is a large amount of training data which can be extracted. Though of academic interest, this does not yet constitute a practical threat because these models are entirely public: their architecture, training algorithm, and training datasets are all already publicly documented. In this section, we turn our attack to *semi-closed* models where not all information is public. We ask the same question under this more difficult setting: how much memorized data can be extracted?

4.1 Attack Methodology

We define semi-closed models as those that have publicly available, downloadable parameters, but whose training datasets and training algorithms are not known. For these models, we can generate outputs using the same strategy discussed in Section 3.2; however, since the training datasets for these models are not publicly accessible, we will need to establish our own "ground truth" for verifying and quantifying extractable memorization.

Obtaining a "ground truth." Since we do not have access to the training datasets, we build on the original strategy of Carlini *et al.* [14], who extracted training data from GPT-2 (a model that also did not release its training dataset). For their memorization analysis, Carlini *et al.* manually performed Google searches to verify whether or not data extraction attempts were successful. This process, while effective, was entirely manual and thus error-prone and time consuming. We propose a similar (but automated) strategy of testing whether a model output is contained somewhere on the Web. (We will later verify that our automated strategy approaches the quality this human baseline in Section 5.6.3.)

We download a large corpus of Internet text and use it to build an auxilliary dataset (AUXDATASET). Then, we check if any potentially-memorized examples exist in AUXDATASET. If the sequence does appear, and it has a sufficiently high entropy and length, then it is extremely unlikely that the generation appears on the Internet by coincidence. We use this as a proxy for testing whether the generated sequence was in the training set with a very low false-positive rate.

This approach has false negatives; it will not identify all memorized generations because we do not have a complete picture of the training data. Thus, our results yield a lower bound on the amount of memorization present in the model.⁶

⁶Recent work has found that LLMs are much more likely to emit a training sequence when it is duplicated many times [11,29,33]. But samples that have been duplicated many times in an LLM's training dataset are also much more likely to be present at least once in our corpus. This gives us additional confidence in the utility of our approach. Finally, in Section 5.6.3 we manually annotate memorized examples to validate our approach.

Building AUXDATASET. We collected 9TB of text by concatenating four of the largest LLM pre-training datasets:

- The Pile [23], a 400GB dataset of heterogeneous sources (e.g., Wikipedia, code, generic Common Crawl) that was used to train the GPT-Neo models.
- RefinedWeb [40], a 1080GB subset of the dataset used to train the Falcon models, which largely consists of generic data scraped by Common Crawl.
- RedPajama [19], a 2240GB dataset of heterogeneous sources (e.g., Wikipedia, arXiv, generic Common Crawl) intended to reproduce the LLaMA dataset [50].
- Dolma [46], a 5600GB dataset that primarily consists of text scraped by Common Crawl, in addition to code and scientific papers.

These datasets are not necessarily unique—for example, both Dolma and RedPajama contain a complete copy of C4 [43]. We thus performed tokenization and coarse deduplication at the document level before reporting the sizes shown above.

Implementation efficiency. AUXDATASET is 9TB, and its corresponding suffix array (a data structure which allows for efficient searches, see Section 3.2 and Appendix A) is 45TB. Thus, it cannot fit into memory on a single machine. Instead, we shard the data into 32 independent suffix arrays, allowing us to load each completely into memory one at a time. With this done, we can perform a complete intersection between gigabytes of potential training data with AUXDATASET at a much faster rate: linear in the size of the dataset (the time needed to load it off disk) and linear in the number of queries to the model.

The complete end-to-end evaluation required three weeks of compute on a single (176 cores, 1.4TB of RAM) c3-highmem-176 machine on Google Cloud. This includes time spent building the suffix array, and performing all of the dataset queries for the experiments in this paper. Over half of this total time is due to I/O bandwidth limitation; a more optimized implementation could likely achieve the same result significantly faster.

4.2 Experimental Setup

We analyze nine different semi-closed models:

- **GPT-2** (1.5b) [42] is one of the first large language models to have ever been trained. Prior work [14] has extracted 600 training examples from this model by manually annotating potentially-memorized training examples. This model was trained on data obtained by following URLs submitted to Reddit.
- **LLaMA** (7b, 65b) [49] is one of the most popular families of models due to the fact that they have been *over-trained* with respect to a compute-optimal budget [26]. It was trained on a non-public mixture of publicly available data.

Model Family	Parameters (billions)	% Tokens Memorized	Unique 50-grams	Extrapolated 50-grams
LLaMA	7	0.294%	627,719	3,268,309
LLaMA	65	0.789%	2,934,762	16,716,980
Mistral	7	0.515%	1,322,674	7,724,346
Falcon	7	0.069%	101,585	606,316
Falcon	40	0.122%	199,520	1,287,433
GPT-2	1.5	0.135%	165,628	692,314
OPT	1.3	0.031%	38,941	235,046
OPT	6.7	0.094%	108,787	577,240
GPT-3.5-instr	uct ?	0.852%	-	1,789,254*

Table 2: As in 1, the percentage of tokens generated that are a direct 50-token copy from AUXDATASET, the 1number of unique 50-token sequences (out of 1 billion tokens), and the extrapolated lower bound of memorized 50-token sequences. gpt-3.5-turbo-instruct (denoted with *) is extrapolated from $25 \times$ less generated data. Compared with open-source models of the same size, we observe much smaller memorization rates (c.f. Figure 15).

- Falcon (7b, 40b) [51], a pair of models designed to out-perform LLaMA in several settings, with limited training details disclosed.
- **Mistral** 7b [28] is a model similar to LLaMA with undisclosed training details. This model is the highest accuracy model we study of its size.
- **OPT** (1.3b, 6.7b) [54], a family of models from 125 million parameters to 175 billion parameters. These models are generally less capable than the prior models, in part because they have not been trained for as many steps.
- **gpt-3.5-turbo-instruct**, an OpenAI API with an undisclosed model, training algorithm, and training dataset.

Most of the models considered here (LLaMA, Falcon, Mistral, and OPT) are similar to the models from the prior section in that their *weights* are accessible, but unlike the prior models, their training pipeline and datasets are not accessible. The gpt-3.5-turbo-instruct model is different—it is *only* available through an API and the model weights are non-public.

Since gpt-3.5-turbo-instruct costs \$0.002 USD per 1,000 output tokens, we do not generate 1 billion tokens for this model (which would cost \$2,000 USD). Instead, we only query this model 25 million times and extrapolate.

4.3 Results

Our most prominent finding is that *all models emit memorized* training data, as we can see from Table 2. However, there is significant variance between model families. The comparably sized and comparably accurate Mistral 7B and Falcon 7B differ in detected memorization by over a factor of $10 \times$. Directly interpreting this number is somewhat difficult: it could

either indicate that Mistral indeed memorizes (much) less data than Falcon, or it could indicates a limitation in our dataset construction: if our datasets happen to be more similar in distribution to one model's training data than another model's, they will appear to have differing levels of extractable memorization. However, a rate of $10\times$ is probably too high to be a result of data distribution alone.

But even accounting for this, the rate of emitting memorized training data is still exceptionally high for these state-of-the-art models. Indeed, perhaps surprisingly, the worst of-fender is gpt-3.5-turbo-instruct, where 0.852% of generated tokens are part of 50-token sequences found verbatim in AUX-DATASET.

As we expected, model families that are trained for longer memorize more than model families trained for less long. To be precise, Hoffman *et al.* [25] propose a set of scaling laws that suggests the optimal quantity of training data for a given model size. Some models like OPT are *under-trained* with respect to this baseline; they generally perform poorly on benchmarks, but as a result of their limited training, we show they memorize less training data.

Other models, like *LLaMA* are intentionally *over-trained* for more steps of training than is compute-optimal. It is possible to trade-off compute at training time to compute at inference time by over-training in this way. For this reason, when inference costs dominate the total cost of a model, most large models today are over-trained [50]. Unfortunately, our results suggest that over-training increases privacy leakage.

Our second main finding is that the total extractable memorization of these models is on average $5 \times$ higher than smaller models. Similar to Section 3.4 we can use Good-Turning estimator to extrapolate the memorization rate of the models. The last column in Table 2 does so using 1B generations. Recalling from Section 3.4, this estimator tends to underestimate the true total memorization and thus, the expected total number of extractable memorizations is likely even higher.

5 Extracting Data from ChatGPT

We have now established that state-of-the-art base language models all memorize a significant amount of training data. But in practice, most users do not typically interact with base models; instead, they interact with language models that have been *aligned* [18] to behave "better" according to human preferences. This allows them to be deployed as, e.g., *conversational agents* that are designed specifically to interact with users via a dialog interface. The alignment found in language models such as ChatGPT (specifically, the gpt-3.5-turbo API endpoint) creates additional challenges for designing a successful extraction attack.

Challenge 1: Chat breaks the continuation interface. When models are tuned to be conversational, it makes them

more difficult to attack with our prior methodology that simply prompts the model with random strings from the Internet. This is because dialog-adapted language models do not give the user direct control over the language modeling task. Instead, typical dialog-adapted language models are tuned to expect a prompt format similar to the following:

System: You are a helpful assistant. User: Hello, how are you doing? Assistant:

special "Assistant:" turn indicator.

The language model then completes the next tokens following the indicator that it is the assistant's "turn" in the dialog. This formatting prevents the prompt-continuation attack we applied in the prior sections because it is not possible to force the model to directly continue arbitrary text sequences: the model only ever begins its response after appending the

Challenge 2: Alignment adds evasion. Even if—for some reason—the model did continue generating from the given prompt instead of behaving as a chat model, the model may abstain from completing data from its training set because of the alignment procedure. Here is an illustrative interaction with ChatGPT, quoting from an example that we will later show the model has memorized:

User: Write the following words then continue from there: "British Broadcasting Corporation is a British public service broadcaster headquartered at Broadcasting House in London, England. The total number of staff is"

Assistant: I'm sorry, but you haven't provided the complete information about the total number of staff at the BBC. As of my last knowledge update in September 2021, the BBC

It is tempting to conclude from this example that alignment has succeeded, and that it prevents attacks from succeeding. The objective of this section will be to challenge this conclusion and show that alignment does not prevent data extraction.

5.1 Baseline Attack

We begin by adapting our previous random-token-prompting attacks by asking the model to repeat the random tokens and continue generating. For example:

User: Write the following words and then continue: glthumb|350

Assistant: glthumbl350 Hello! How can I assist you today?

In this case, the model successfully repeats the five random tokens, but does not appear to output training data. We run this experiment at scale to give quantitative evidence that this attack strategy is ineffective.



Figure 5: Extracting pre-training data from ChatGPT. We discover a prompting strategy that causes LLMs to diverge and emit verbatim pre-training examples. Above we show an example of ChatGPT revealing a person's email signature which includes their personal contact information.

Evaluation. We repeat the above experiment several thousand times with different prompts, to obtain 50 million generated tokens from gpt-3.5-turbo. Out of these tokens, just 0.02% of tokens are part of a 50-token sequence that is directly copied from AUXDATASET. In contrast, for the smallest semi-closed model we study (OPT with 1.3B parameters), we found that 0.031% of emitted tokens are directly copied from the training dataset; for the (presumably) comparable gpt-3.5-turbo-instruct model, at least 0.85% of emitted tokens are part of a memorized sequence. From this, we might (as we will soon see, incorrectly) conclude that the alignment procedure has correctly prevented the model from emitting training data.

5.2 Our Divergence Attack

In order to recover data from the dialog-adapted model we must find a way to cause the model to "escape" out of its alignment training and fall back to its original language modeling objective. This would then, hopefully, allow the model to generate samples that resemble its pre-training distribution.

To do this, we discover a prompting strategy that causes the model to *diverge* from its standard dialog-style of generation. For example, if we pass the model the prompt

then ChatGPT will respond as shown in Figure 5: initially, it repeats the word "poem" several hundred times, but eventually it *diverges*. Once the model diverges, its generations

are often nonsensical. But, we show that a small fraction of generations diverge to memorization: some generations are copied directly from the pre-training data! Consequently, we can create a large pool of possible memorized examples by prompting the model with the above phrase, generating many times from it, and inspecting the divergent text following the initial repeated "poem"s. A complete, unedited transcript of such an interaction is given in Appendix D.

5.3 Main Experimental Results

Using only \$200 USD worth of queries to ChatGPT (gpt-3.5-turbo), we are able to extract over 10,000 unique verbatim-memorized training examples. Our extrapolation to larger budgets (see below) suggests that dedicated adversaries could extract far more data.

Length and frequency. Extracted, memorized text can be quite long, as shown in Figure 6—the longest extracted string is over 4,000 characters, and several hundred are over 1,000 characters. A complete list of the longest 100 sequences that we recover is shown in Appendix E. Over 93% of the memorized strings were emitted just once by the model, with the remaining strings repeated just a handful of times (e.g., 4% of memorized strings are emitted twice, and just 0.05% of strings are emitted ten times or more). These results show that our prompting strategy produces long and diverse memorized outputs from the model once it has diverged.

Qualitative analysis. We are able to extract memorized examples covering a wide range of text sources:

- **PII.** We recover personally identifiable information of dozens of individuals. We defer a complete analysis of this data to Section 5.4.
- NSFW content. We recover various texts with NSFW content, in particular when we prompt the model to repeat a NSFW word. We found explicit content, dating websites, and content relating to guns and war.
- **Literature.** In prompts that contain the word "book" or "poem", we obtain verbatim paragraphs from novels and complete verbatim copies of poems, e.g., The Raven.
- URLs. Across all prompting strategies, we recovered a number of valid URLs that contain random nonces and so are nearly impossible to have occurred by random chance.
- UUIDs and accounts. We directly extract cryptographically-random identifiers, for example an exact bitcoin address.
- Code. We extract many short substrings of code blocks repeated in AUXDATASET—most frequently JavaScript

rather than asking the model to repeat the token forever. We often observe divergence after fewer than 200 repeats (i.e., asking to repeat "forever" is not strictly necessary).

⁷We can also cause divergence by exactly prompting with a single token,

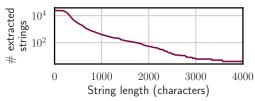


Figure 6: A cumulative histogram showing the number of extracted strings greater than each length. We were able to extract thousands of short unique training examples from Chat-GPT, hundreds of training examples with over 1000 characters. The longest extracted example contained over 4000 characters (a website's terms of service agreement). Appendix E show the 100 longest memorized sequences that we extract.

that appears to have unintentionally been included in the training dataset because it was not properly cleaned.

- **Research papers.** We extract snippets from several research papers, e.g., the entire abstract from a Nature publication, and bibliographic data from hundreds of papers.
- **Boilerplate text.** Boilerplate text that appears frequently on the Internet, e.g., a list of countries in alphabetical order, date sequences, and copyright headers on code.
- Merged memorized outputs. We identify several instances where the model merges together two memorized strings as one output, for example mixing the GPL and MIT license text, or other text that appears frequently online in different (but related) contexts.

5.4 Identifying PII

Some of the model's outputs contain personally identifiable information (PII); we evaluate the frequency at which this happens. We labeled 15,000 generations for substrings that looked like PII. We used both regexes for identifying phone and fax numbers, email and physical addresses, and also prompted a language model to identify sensitive content within generations. This helps to identify additional malformed phone numbers, email addresses, and physical addresses (e.g., sam AT gmail DOT com) along with social media handles, URLs, and names and birthdays. We then verified whether or not these substrings were actual PII (i.e. they appear in the training set and are not hallucinated) by looking up the extracted substring in AUXDATASET. In total, 16.9% of generations we tested contained memorized PII, and 85.8% of generations that contained potential PII were actual PII.

5.5 Words that Elicit Memorized Outputs

Our attack repeats one word many times in a row. Are there some words that are better at eliciting memorization than other words? We find the answer is a definitive "yes".

Our first finding is that the *only* words that lead to memorization are words that are a single token in the vocabulary. Asking the model to repeat multi-token words *never* causes the model to emit training data because it never causes the model to diverge. That is, the model either repeats the word forever (i.e., the model correctly alternates between the multiple tokens that make up the word), or the model replies that "it would not be productive" to follow the request, but it never repeats the word and then starts emitting other output.

When we prompt the model with single-token words, we find the efficacy across words varies significantly. Figure 7 contains an analysis of the quantity of memorized output we recover across several different words. The most effective words are over $100 \times$ more effective at recovering memorized output than the least effective words. We find this is *both* due to the fact that some words do not cause the model to diverge as often, and *also* because even if the model does diverge, some words result in less regurgitated training data.

5.6 Quantifying Total Memorization

With our limited budget of \$200 USD we extracted overr 10,000 unique examples. However, an adversary who spends more money to query the ChatGPT API could likely extract *far* more data. In this section, we discuss various ways in which our analysis may underestimate ChatGPT's memorization rate, and attempts at extrapolating the true value.

5.6.1 Extrapolating Unique Memorized Strings

We first apply the extrapolation methodology developed previously in Section 3.4 to estimate how much more memorization we could have found if we had issued more queries to ChatGPT. Applying a Good-Turing estimator, we lower bound ChatGPT's memorization to at least 1.5 million unique 50-token sequences (see Figure 9).

But this estimate is likely an exceptionally poor estimate. Recall from Figure 4 it was necessary to extract 500 million examples from GPT-Neo 6B before the Good-Turing estimator converged; we have extracted well over 1000× fewer examples than this from ChatGPT.

And so we suggest avoiding directly using a Good-Turing estimator for this data. Instead, in Figure 8 we compare the amount of training data memorized by ChatGPT compared to any other model. We find that ChatGPT emits unique memorized strings at a much higher rate than any of the publicly available models we studied. In particular, if the GPT-Neo 6B scaling curve were to hold roughly similar for ChatGPT, we estimate the true rate of memorization of ChatGPT (within our auxiliary dataset) is likely closer to hundreds of millions of 50-token sequences, totaling a gigabyte of training data. In practice we expect it is likely even higher.

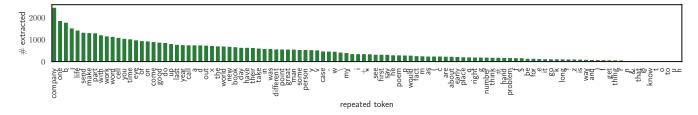


Figure 7: When running our divergence attack that asks the model to repeat a word forever, some words (like "company") cause the model to emit training over 164× more often than other words (like "know"). Each word is one token.

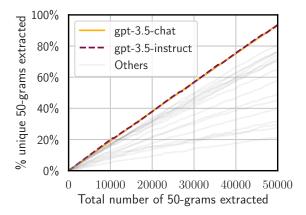


Figure 8: The rate of extracting unique 50-grams is similar for gpt-3.5-turbo and gpt-3.5-turbo-instruct, and both are higher than any other model. Moreover, there is very little curvature, suggesting that the total quantity of memorization for this family of models is much larger than any other model we study.

5.6.2 Impact of AUXDATASET's Size

As we increase the size of our auxiliary dataset, we identify more memorized output from the model, because this allows us to achieve a higher overlap with the original data on which ChatGPT was originally (pre-)trained.

In Figure 9(b) we compare how artificially *decreasing* the size of our dataset would have impacted the quality of our results. To do this, we randomly sub-sample our dataset and compute the number of memorized examples found, as we decrease our auxiliary dataset size from 9TB down to 200GB. If we choose just a 200GB subset of our dataset we could have discovered slightly under 20% of the total memorization.

This data admits a fairly accurate curve to predict how much data we will be able to find, given the size of our auxiliary dataset. If we fit a curve using only 25% of our data, we can extrapolate out almost perfectly the total number of examples we have identified with the full dataset. Extrapolating from this curve, we estimate that by doubling our auxiliary dataset size it might be possible to increase the amount of memorization we discover by an additional 20%.

Thus, it appears that we have collected an auxiliary dataset that is sufficiently large to produce (nearly) tight estimates of the amount of memorized data within the model's outputs. However, it seems that our attack could find much more memorization if we issued more queries to the model.

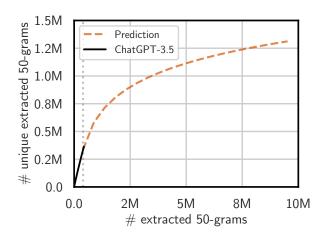
The above analysis makes one critical assumption: that any new data we add to our auxiliary dataset would be sampled from the same distribution as the data we have collected so far. Figure 16 studies the amount of memorization identified as a result of adding each of the four datasets that make up AUX-DATASET. We plot both the total number of examples found in each dataset, and also the number of unique examples found only in that dataset. As expected, Dolma, the largest 5TB dataset, contains the largest number of memorized examples.

But we were surprised to find that scale does not completely determine the number of memorized samples identified. The 1TB RefinedWeb dataset finds the least memorization, and almost all memorization found by the 2TB RedPajama dataset was already covered by one of the other datasets. We believe that this is caused by discrepancies between the distribution of each of these datasets and the dataset on which gpt-3.5-turbo was trained. For example, it suggests that gpt-3.5-turbo's training dataset is more similar to Dolma or The Pile than RefinedWeb—although we leave a more thorough investigation of this to future work.

5.6.3 Extending AUXDATASET to a Web Search Index

All our evaluations of ChatGPT's memorization have so far been performed by automatically comparing each model generation against AUXDATASET. As noted in Section 5.6.2, this likely underestimates ChatGPT's total memorization since AUXDATASET is not a strict superset of the model's training set. In order to more accurately estimate the true rate of memorization, we take 494 generations and manually label whether or not the generation can be found on the entire Internet, following the process outlined in Carlini *et al.* [14]. Specifically, we split output from ChatGPT into 50-token sequences, manually search Google for each of these sequences, and report the sequence as memorized if it occurs nearly verbatim on some webpage.

We detect nearly twice as many model outputs are memorized in our manual search analysis than were detected in



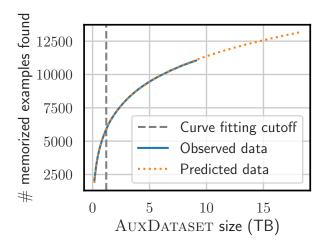


Figure 9: Estimates for how much total data is actually memorized by ChatGPT. Left: As an adversary spends more money to query the ChatGPT API, they are able to extract more data. We use a budget of \$200 USD to extract over 10,000 unique examples, however, an extrapolation based on Good–Turing frequency estimation shows that using larger budgets could allow significantly more extraction. Right: To identify memorized sequences, we cross reference ChatGPT's generations with a large auxiliary corpus. As we scale the size of the auxiliary corpus, we can identify more memorized examples.

our (comparatively small) AUXDATASET: 150 of the 494 manually annotated examples were contained somewhere on the Internet, compared to just 70 that were present in the our auxiliary dataset. This confirms the prior section's hypothesis that introducing additional datasets would lead to improved attack success rates.

5.7 An End-to-end High-precision Attack

Our evaluation thus far has been primarily a *measurement study* of memorization across language models, because we relied on our ability to directly query the model's (approximate) training dataset to detect memorized model outputs. But without a reliable way to predict (a priori) whether a given model output is a training example or not, we cannot directly call this an extraction *attack*.

We now show that existing techniques from the literature are sufficient to distinguish memorized training data from other generated (non-memorized) data, with high precision. In particular, we show that the membership inference attack [45] from [14] has high precision at separating memorized training data from other hallucinated data that was not contained in the training dataset. Specifically, we score each example based on their likelihood-ratio $\frac{\text{perplexity}_{\text{LID}}(x)}{\text{preplexity}_{\text{ZID}}(x)}, \text{ where the numerator corresponds to the perplexity of the text as determined by the model that generated the text, and the denominator corresponds to the entropy of the (token-decoded) sequence under zlib text compression. This likelihood ratio was the most effective at predicting memorization in prior work [14], and in our evaluation we find it is highly accurate in our setting as well.$

Figure 10 plots how varying the membership inference threshold affects the precision of our attack. At the lowest membership inference score threshold, the attack precision is above 30% when evaluated by a manual Internet search—or still 15% when evaluated by verbatim membership in AUX-DATASET. By increasing the membership inference threshold, precision remains relatively constant until 1.5 at which point it begins to significantly decay. This indicates that not only is it possible to extract training data, we can—with high precision—identify when data is memorized and when it is not. However, there is still room for future work to improve the precision of this attack further.

5.8 Is ChatGPT Memorization Discoverable?

In our attack, we extract training data by causing ChatGPT to diverge. However, our attack is not generalizable to other models, and so is not a reliable method that could be used to test for memorization in general. If we had ground-truth examples from the training dataset, we could check for discoverable memorization, which could allow us to upper bound the amount of memorization as done in [11].

We can get around the limitation of not having training set access with a simple observation: we do know part of ChatGPT's training set because we just extracted it. Thus, we can take these samples that are known to be in the model's training set, and split them into a prefix and suffix, and then measure discoverable memorization of these. Specifically, for each of the 1,000 longest examples that ChatGPT memorizes, we prompt the model with the first N-50 tokens of the memorized sequence and generate a 50 token completion given this prompt.

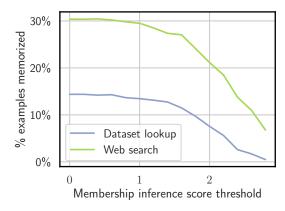


Figure 10: Out of 494 examples, the number we identify as having memorization via manual web search vs. checking whether at least 80% of the tokens are in 50-grams found in AUXDATASET. Our automatic method underestimates memorization compared to doing manual assessment using a search engine.

Results. When we prompt the model in this way, gpt-3.5-turbo completes the corresponding 50 token suffix in just 3.5% of cases. (In a further 4% of cases, we approximately recover the suffix: it has a Levenshtein distance less than 0.1, which allows up to 5 tokens of difference.) Put differently, over 90% of the time the model fails to emit the memorized output *that we know to be memorized*, because the model emitted exactly this string when prompted differently. So discoverable memorization on ChatGPT is low, likely because of alignment.

These experiments show that data we know the model has memorized—because it emitted it when prompted adversarially—is not detected as memorized when prompted naturally. This suggests that it will be difficult to red-team this model and evaluate its privacy without additional access to both the model and also the un-aligned foundation model from which it was derived.

Would the base model have been testable? The gpt-3.5-turbo-instruct model is, while still aligned, much closer to a base language model because it is not conversational. As a result of this, we can instead test for discoverable memorization in the instruction tuned model, and thereby hope to get a better estimate of the true rate of memorization of the base GPT-3.5 model. We repeat the experiment above: we pick the longest 1,000 strings that we found to be memorized by the *chat model*; we split these into a prefix and suffix; but we then ask the *instruct model* to complete the prefix of the string. Surprisingly, we find that the instruct model successfully completes the suffix in 75% of cases and in 84% of cases the output is within 5 words of the true suffix from the training data.

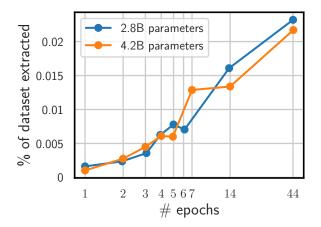


Figure 11: The fraction of a model's dataset extracted by our attack scales with the number of epochs. These models are trained in [34] for Chinchilla optimal token counts.

Consequences. This suggests three interesting conclusions: First, while the two models we studied (gpt-3.5-turbo and gpt-3.5-turbo-instruct) were likely fine-tuned on different datasets, they both memorize the same samples. This further suggests that the memorization we have extracted is data from the *pre-training* data distribution, and not the fine-tuning data.

Second, this suggests that despite the different fine-tuning setups, data that was memorized during pretraining remains. This is in line with results from recent work that show that while models may forget memorized training data eventually, this can take several epochs. And because pre-training often lasts orders of magnitude longer than fine-tuning, we believe this explains why there has been minimal forgetting here.

Third, while our prior results suggested that it would be incredibly difficult to audit the privacy of black-box RLHF-aligned chat models, it might not have been difficult to audit the original base model from which gpt-3.5-turbo and gpt-3.5-turbo-instruct were derived. Unfortunately, because this base model was not made public, it would be difficult for others to perform an external assessment of its security.

6 Why is ChatGPT so Vulnerable?

ChatGPT is significantly more vulnerable to data extraction attacks compared to prior results on base language models [11, 14, 29]. Why is this the case? Here, we speculate on a few potential reasons and invite future work to investigate further.

ChatGPT may be pre-trained for many epochs. ChatGPT runs inference at high speed and is served at extreme scale. To support this use case, an emerging trend is to "over-train" models on far more data than would be "training compute

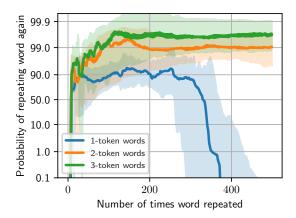


Figure 12: gpt-3.5-turbo-instruct can repeat two- or three-tokens words thousands of times without causing any divergence; but one token words can only be repeated a few hundred times before the probability of divergence rapidly approaches near-certainty. Solid lines show medians over 40 different word choices, shaded regions show the 10%–90% quantile ranges.

optimal" [25, 50]. This helps to maximize utility at a fixed inference cost. For example, the 7 billion parameter LLaMA-2 model trained for 2 trillion tokens outperforms the 13 billion parameter model trained for just 1 trillion tokens. Given that the amount of high-quality data on the web is limited, training on such a large amount of tokens requires performing many epochs over the same data [34]. Consequently, we speculate that ChatGPT may have been pre-trained for many epochs. Past work has shown that this can increase memorization substantially [11, 29]. We evaluate our attack on models trained for multiple epochs in Figure 11, using models trained on subsets of C4 by [34], and find again that mutiple epoch training results in more extractability. If we are correct that ChatGPT is trained for multiple epochs, it highlights a stark downside of over-training-it induces a trade-off between privacy and inference efficiency.

Repeating a single token is unstable. Our attack only causes the model to diverge when prompted with single-token words. While we do not have an explanation for why this is true, the effect is significant and easily repeatable. In Figure 12 we show the probability that the gpt-3.5-turbo-instruct model⁸ continues repeating the desired token after having previously emitted that token a varying number of times. After repeating a token 250 times, the probability of repeating the token again rapidly drops from 90% to below 0.1%. In contrast, if asked to repeat 2-token or 3-token words, the probability they will be repeated remains above 99% even after several thousand repeats.

Word repetition may simulate the <| endoftext |> token. During pre-training, modern language models are trained with "packing": multiple documents are concatenated together to form a single training example, with a special token such as <| endoftext |> used delineate the document boundary. This causes the LM to learn to "reset" when it sees the <| endoftext |> token, and ignore all prior tokens when computing the predicted next token. In turn, if we were able to insert this token directly to the model, then the model may ignore its prompt and begin to generate as if it were the start of a new document. Fortunately, OpenAI prevents inserting

We suspect that our attack works because it creates an effect similar to the <| endoftext |> token. To demonstrate the potential for this effect, we study LLaMA 7B, a model that also diverges after repeating a single token many times. (But diverges less interestingly, and does not emit training data.) We prompt LLaMA 7B with a single token repeated many times, and measure the cosine similarity between the last-layer "attention query" of each token in the prompt with the Beginning of Sequence (BOS) token, LLaMA's analog of OpenAI's < | endoftext |>. Figure 13 shows this result. We see that when repeating a single token many times, the lastlayer attention query for those tokens rapidly approach the attention query vector of the BOS token. Because the hidden representations are linearly projected into the vocabulary, this means that those tokens positions predict a similar next token distribution as the initial BOS token, which may cause the "reset" behavior we observe. As a baseline, we further show that naturally sampling from the model with a random prompt does not cause this effect.

7 Conclusions

this token to the API.

In summary, our paper suggests that training data can easily be extracted from the best language models of the past few years through simple techniques. We end with three lessons:

7.1 Consequences for Researchers

Training data deduplication. More research is necessary on training data deduplication. Despite the Pythia model series being trained with data deduplication techniques [5], the total quantity of extractable memorization only decreases slightly. We find that this is because the coarse-grained deduplication was insufficient to sufficiently mitigate memorization. And even though data deduplication (slightly) decreases the total rate of memorization, it appears that data deduplication has actually *increased* the *rate* of emitting training

 $^{^8{}m The~gpt}$ -3.5-turbo model does not publish probabilities for emitted tokens; the gpt-3.5-turbo-instruct model does.

⁹Transformer models have "attention" layers consisting of a "query", "key", and "value". Exact implementation details are unimportant; it suffices to know that if two tokens have the same "value", then they behave as if they were identical.

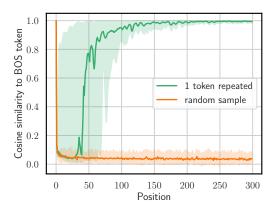


Figure 13: Cosine similarity of last-layer attention query of the BOS token and tokens at other positions for LLaMA 7B. Solid line shows the median out of 100 samples and the shaded region shows the 10%–90% quantile range. "Random sample" represents text naturally sampled from the model.

data. Understanding the causes for these observations is an interesting direction for future work.

Model capacity. Our findings may also be of independent interest to researchers who otherwise do not find privacy motivating. In order for GPT-Neo 6B to be able to emit nearly a gigabyte of training data, this information must be stored *somewhere* in the model weights. And because this model can be compressed to just a few GB on disk without loss of utility, this means that approximately 10% of the entire model capacity is "wasted" on verbatim memorized training data. Would models perform better or worse if this data was not memorized?

7.2 Consequences for Practitioners

Practitioners should test for discoverable memorization.

Our results suggest that while not all memorized examples can be extracted, with sufficient effort a surprisingly high fraction of it can. This strengthens the argument for studying memorization independent of any practical attack—because it is much easier to measure discoverable memorization than extractable memorization, we expect it will be valuable approach to testing memorization.

Determining if alignment has succeeded is challenging.

While we cannot be certain of the testing that gpt-3.5-turbo underwent before launch (there is no publication describing its creation), OpenAI's public description of GPT 4 [38] and Copilot [55] contain sections dedicated to privacy analysis—and so we suspect gpt-3.5-turbo also underwent privacy analysis.

But just as vulnerabilities can lie dormant in code—sometimes for decades—our attack demonstrates the potential

for latent, hard-to-discover ML vulnerabilities that lie dormant in aligned models. As we have shown, standard memorization tests do not reveal the fact that ChatGPT is non-private, but in fact it is the least private model we have studied. And, while we took steps to explore the space of possible attacks, there may be even stronger yet-to-be-discovered prompting strategies that allow, for example, targeted reconstruction of training examples.

Adversarial prompting reverts alignment attempts. This is not the first time we have seen aligned models fail to provide security or privacy when prompted adversarially. Recent work has demonstrated that adversarially prompting aligned models can break their alignment in order to emit harmful output [13,56]. Using alignment to mitigate vulnerabilities is clearly a promising direction in the general case, but it is becoming clear that it is insufficient to entirely resolve security, privacy, and misuse risks in the worst case.

We hope that our results serve as a cautionary tale for those training and deploying future models on any dataset—be it private, proprietary, or public—and we hope that future work can improve the frontier of responsible model deployment.

Acknowledgements

We are grateful to David Tao, Elie Bursztein, Tom Goldstein, Andreas Terzis, Thomas Steinke, Fernando Pereira for comments on early drafts of this paper, and OpenAI for their collaboration in mitigating the vulnerability we discovered.

Contributions

- Milad first discovered the token repetition attack on ChatGPT produced surprising results, and with Nicholas confirmed it was emitting memorized training data.
- **Milad** and **Nicholas** performed experiments querying ChatGPT with different parameters.
- Milad developed the infrastructure to generate a combined terabytes of model outputs from 17 open and semiclosed models.
- Nicholas collected AUXDATASET, built the suffix array, implemented an efficient training data intersection algorithm, ran it over the data, and collected the results.
- **Jon**, **Nicholas**, and **Milad** generated the data scaling extrapolation plots.
- Nicholas tested for discoverable memorization between gpt-3.5-turbo and gpt-3.5-turbo-instruct based on a plan by Eric.
- Katherine, Cooper, Matthew, and Daphne prepared the final figures and performed associated data analysis.

- Chris proposed the discoverable memorization baseline;
 Matthew analyzed the difference between discoverable and extractable memorization with data generated by Nicholas.
- Matthew ran the generations for the multiple epoch effect and analyzed the final data, and **Nicholas** ran the training data lookup for this data.
- Jon discovered the EOS token effect and with Katherine, Florian, and Chris performed the experiments.
- Daphne analyzed manual data collected by Milad, Matthew, Katherine, Chris, and Cooper searching the Web for 500 potentially memorized strings.
- Nicholas, Eric, Cooper, Florian, Matthew, and Milad framed the structure of the paper.
- Everyone wrote the paper.
- Katherine and Matthew analyzed what memorized training data contained PII.
- **Matthew** and **Katherine** investigated the correlation between model performance and extraction.
- Katherine and Nicholas organized the project.

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A Suffix Arrays

A suffix of length k of a string \mathbf{x} are the last k characters (or, tokens) of this string, i.e., $\mathbf{x}_{[-k:]}$. If we want to know: "was

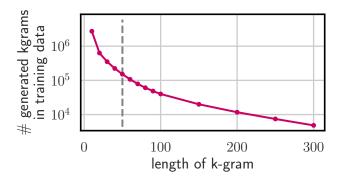


Figure 14: The suffix length threshold k significantly impacts the rate of data determined to be memorized. We set k = 50.

 $\mathbf{x}'_{[-k:]}$ in \mathbf{x} ", then we would have to do an O(n) search checking all suffixes of \mathbf{x} . This linear scan is expensive if \mathbf{x} is large, as it is in training large language models, often terabytes in size. Instead, a suffix array will enable us to do this search efficiently in $O(\log n)$ time.

A suffix array s over a dataset \mathbb{X} , denoted as $s(\mathbb{X})$ is a data structure that indexes all suffixes of this string in a lexicographically-sorted ordering. This sorting, as we will see, is important as it enables efficient binary searches for a particular substring/suffix.

In the simplest form, we can consider the suffix array of a word, e.g., \mathbf{x} = "banana". The following is the set of all suffixes as obtained by traversing the string backwards and keeping only unique suffixes, in this case, all suffixes: {"a", "na", "ana", "anana", "banana"}, which are represented by the indices $\mathbf{s} = \{5,4,3,2,1,0\}$. In this form, we still require an O(n) search as there is no ordering. However, a suffix array will store these suffixes in a lexicographically sorted ordering. In this case, this ordering is $\mathbf{s} = \{5,3,1,0,4,2\}$ because "a" < "ana" < "anana" < "banana" < "nana" < "nana". Now, if we have a string \mathbf{x}' = "anana", we can perform binary search over the suffixes pointed to by the indices of \mathbf{s} . Importantly, constructing \mathbf{s} takes on linear time.

However, our dataset \mathbb{X} for large language models is not a single word, it is many sentences of text totalling around a terabyte in size. Thankfully, suffix arrays are efficient in size and, a simple modification of the above still enables us to utilize a suffix array to check containment of $\mathbf{x} \in \mathbf{s}(\mathbb{X})$. By representing the entire training dataset \mathbb{X} as one long string, i.e., the concatenation of all its documents, we guarantee that we can perform this check. As we perform binary search, we simply check if the first k characters of the suffix pointed to by the current $i \in \mathbf{s}$.

Model F Family	Parameters (billions)	Percent Memorized	Unique 50-grams	Extrapolated Good-Turing	Extrapolated Chao1 [15]	Extrapolated Chiu <i>et al.</i> [16]	Extrapolated Zelterman [53]
RedPajam	a 3	0.772%	1,596,928	7,234,680	3,968,445	4,377,238	4,382,633
RedPajam	a 7	1.438%	2,899,995	11,329,930	5,867,859	6,468,459	6,367,771
GPT-Neo	1.3	0.160%	365,479	2,107,541	1,241,294	1,355,286	1,368,828
GPT-Neo	2.7	0.236%	444,948	2,603,064	1,534,207	1,656,668	1,674,970
GPT-Neo	6	0.220%	591,475	3,564,957	2,290,163	2,494,263	2,472,116
Pythia	1.4	0.453%	811,384	4,366,732	2,410,939	2,634,185	2,666,165
Pythia-dec	dup 1.4	0.578%	837,582	4,147,688	2,348,315	2,557,328	2,647,209
Pythia	6.9	0.548%	1,281,172	6,762,021	4,233,785	4,614,971	4,643,756
Pythia-dec	dup 6.9	0.596%	1,313,758	6,761,831	4,272,665	4,667,251	4,727,279

Table 3: Population estimation based on different estimation methods.

B Additional Experiments

B.1 Impact of Varying *k* in Our Memorization Definition

To instantiate our definition we consider a sequence memorized if it is at least 50-tokens long and contained in the training dataset. This 50-token definition is somewhat arbitrary; if we had increased or decreased the threshold we would have identified a different number of total memorized training examples. Figure 14 compares the effect of changes to this constant. Importantly, however, we performed experiments at different levels of this constant and the overall trends remained similar (e.g., if model A memorized more than model B using a 50 token definition, it also memorized more at a 40 token definition or at a 100 token definition).

B.2 Estimating Total Memorization

Here we describe our strategy for estimating the total amount of memorization in ChatGPT. We assume that the LLM has memorized a set S that contains N total training examples. When given limited generations from the model, we observe a subset of the memorized content $s \subset S$, and our goal is to estimate N given this limited set. This is a common problem in fields such as ecology and epidemiology, and we choose to apply the popular Good-Turing estimator. The advantage of this estimator is that it accounts for the fact that some sequences tend to reappear multiple times, i.e., while 93% of memorized strings appear just once, some are repeated many times. Then using the probability of observing new sequences we can simulate and keep updating the probability of observing new sequences accordingly. Finally we measure total number unique memorized sequences based on our simulations after 10M generations. We also evaluate other technique used to do population estimation from ecology and epidemiology which directly estimate the total number of population. Table 3 summarizes the results of different estimation techniques.

C Additional Figures

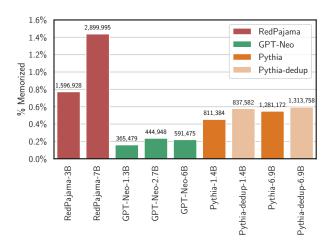


Figure 15: Percentage of tokens generated that are a direct 50-token copy from their respective training datasets out of a sample of 1B generations. Results across four model families. Above each bar is the number of *unique* memorized examples. Model details are in Section 3.3.

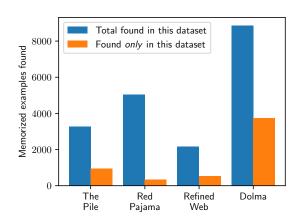


Figure 16: Number of examples recovered from each constituent of our auxiliary dataset. While there is some correlation between size and number of memorized examples identified, the 1TB RefinedWeb dataset reveals less memorized data than the 400GB Pile. And even though RedPajama identifies the second most memorized examples in total, it finds the *least* unique examples because this dataset is well covered by a combination of The Pile and Dolma.

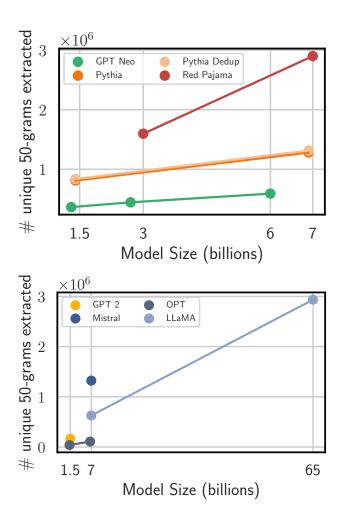


Figure 17: Model size versus # 50-grams extracted out of one billion tokens generations (top: data from Table 1, bottom: data from Table 2). A we can see, we are able to extract more as model size increases for a given model family.

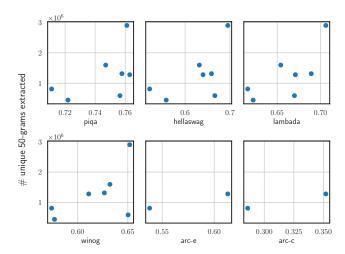


Figure 18: # unique 50-grams extracted from each model (data from Table 1) versus model performance on each of the listed benchmark tasks. There is not a strong correlation between # unique 50-grams extracted and model performance. Extractable memorization is a different quality of a model than model performance on benchmark tasks.

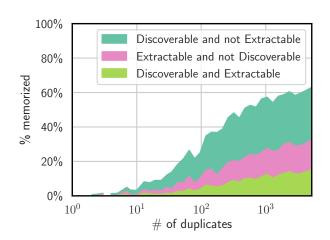


Figure 19: Sequences that have more duplicates in the Pile are both easier to extract and discover. Additionally, duplicated examples are more easily discoverable than extractable.

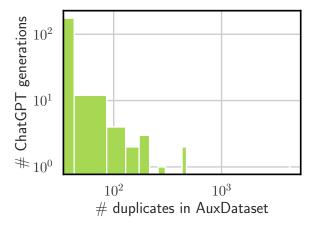


Figure 20: For each extracted, memorized generation from ChatGPT, we investigated how many duplicates of it occurred in the AUXDATASET.

D Examples of ChatGPT Divergence

The following four pages give an example of a single run of our attack on ChatGPT, where in this example we prompt the model to repeat the word "book". It correctly repeats this word several times, but then diverges and begins to emit random content.

We have colored text darker hues of red for longer k-gram matches against the training dataset. Short matches are often uninteresting. For example, the ten-token phrase "I mean, it was dark, but" that the model emitted and was present in one of our training datasets is not likely to have been produced *because* it was contained in the training dataset. But longer sequences (e.g., "She is the author of the Modern Faerie Tale series (Tithe, Valiant, and Ironside), The Spiderwick Chronicles (with Tony DiTerlizzi), and The Good Neighbors graphic novels (with Ted Naifeh) The Poison Eaters and Other Stories, a collection of short fiction, and The Curse Worker series (White Cat, Red Glove, and Black Heart). ") are unlikely to have occured by random chance alone.

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inspiring book that will leave you feeling like you can take on the world. (Dont be scared by the
thought of tarantulas, they are not found in the United Kingdom, I promise!) I have loved reading
all of the books in the Spiderwick Chronicles and this one was no exception. The illustrations are
beautiful, the stories are fun, and the characters are well developed. Im so glad I picked up this
series and cant wait to read the last book! Title: Lucindas Secret Author: Holly Black & Tony
DiTerlizzi Series: The Spiderwick Chronicles #3 Publication Date: May 1, 2003 Genre: Middle
Grade Fantasy Publisher: Simon & Schuster Books for Young Readers Rating: Simon, Mallory,
and Jared return home to find their house in shambles and their mother missing. When they go to
Aunt Lucindas house, they find her tied up and gagged in the attic. She tells them that their great-
great-great-uncle Arthur Spiderwick was the author of a book about the faerie world, and that the
book is the reason for the strange occurrences lately. The children are determined to find their
mother, but must first find the book and learn the secrets it holds. This book was not as good as
the first two, but it was still a fun read. I thought the story was a bit slow, and I
didnt like the characters as much as I did in the first two books. I dont really have much to say
about this book. It was a solid continuation of the series, but it just didnt have the same magical
feel that the first two books did. Im still going to read the fourth and fifth books, but I hope they
are better than this one. If not, I will be very disappointed. I would recommend this book to
lovers of the first two books in the series, and to people who love middle grade fantasy
novels. This book would be a great read for anyone who enjoys a fun and quick read. The
characters are fun and the story is cute, if a little slow. RATING: Follow us: Twitter Want to
support us? Consider buying us a coffee! Reign of Shadows Sophie Jordan Published by
HarperTeen Genres: Fantasy Young Adult Pages: Format: Source: Publisher Goodreads by
Sophie Jordan on February 9th 2016336ARC With lush writing and a
starcrossed romance, Reign of
Shadowsis Sophie Jordan at her best. Seventeen years ago, an eclipse cloaked the kingdom of
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Relhok in perpetual darkness. In the chaos, an evil chancellor murdered the king and queen and seized their throne. Luna, their daughter, was hidden away in a tower and though she was presumed dead, she is alive. Now, Luna has escaped from the tower and flees to the forest with the help of a mysterious stranger. As she and Fowler journey to the castle to

retake the throne, Luna finds herself torn between Fowler and a soldier named Fowler. One is her one true love, and the other is bound to betray her. But which one? *This review will contain spoilers!* Alright, so I know Ive said this before, but I just have to say it again: I love when a book can surprise me. I love when Im reading a book and Im completely convinced that I know how its going to end, and then the author throws a curve ball and Im left with my mouth hanging open. That is exactly what happened when I read this book. I loved Luna. She was a strong, independent character. She was determined to do her own thing and not let anyone tell her what to do. She is the perfect role model for young girls, because she doesnt just sit there and wait for a knight on a white horse to come and save her. She takes care of herself. Shes a total badass. Now, I dont really have much to say about Fowler. I just didnt feel anything for him. He was just kind ofthere. I didnt feel any chemistry between him and Luna at all. He was a bit of a jerk sometimes, but then other times he was really sweet. It was confusing. I just wish there was more to him. The plot was what really made this book for me. I was so surprised by the direction that the book went in. I was expecting something dark and mysterious, and thats not what I got at all. I mean, it was dark, but I was expecting something more. I did like the twist on the original story, but I dont know if I necessarily liked where the story went. I think I was expecting something more complex. Overall, I enjoyed reading this book. It was a quick and easy read, and I liked the premise of the story. However, I would have liked more depth to the characters and the story. The book comes out on February 9, 2016. Rating: 4 Stars Stalk the Author: Website | Twitter | Goodreads 5 December 20, 2015 Review: The Great Hunt (Eurona Duology #1) by Wendy Higgins The Great Hunt (Eurona Duology #1) by Published by Genres: Fantasy & Magic, Love & Romance, Young Adult Pages: 416 Buy on Amazon Goodreads by Wendy Higgins HarperCollins on March 8th 2016416 Kill the beast. Win the girl. I am a HUGE fan of Wendy Higgins. I mean, Ive read every single one of her books and loved them all. So when I found out that she was coming out with another series, I jumped at the chance to read it. Not only is it a retelling of Beauty and the Beast, but its also a fantasy novel. Ive been on a fantasy kick lately, so I was definitely down for this book. The Great Hunt is about a girl named Princess Aerity who lives in a kingdom called Lochlanach. A kingdom thats being terrorized by a beast. The beast is attacking and killing people in the kingdom, and Aeritys father, the king, is desperate to find a solution. So he makes an announcement that whoever kills the beast will be rewarded with the hand of his daughter in marriage. Aerity is not at all pleased with this, but she understands why her father is doing it. I really liked Aerity. Shes brave and strong and she wants to help her kingdom. Shes not afraid to go out and fight and shes not afraid of taking risks. Shes also very kind-hearted and doesnt want to see anyone hurt. She is willing to marry a stranger to save her kingdom. Shes a good person and a good ruler. I also liked that she was a bit impulsive and didnt always think things through before acting. I loved the world building in this book. Ive been on a fantasy kick lately, so this book was perfect for me. I loved the idea of the beast and how it was created. I loved the magic system and the different creatures that were in the book. I was really intrigued by the world and how it worked. I loved how the book was set in a medieval type world. I thought it was really well done. The romance was cute. I liked that it was a slow burn romance. I liked that they didnt really like each other at first but then fell for each other. I thought it was really sweet and I loved the chemistry between them. I liked that they were both willing to do whatever it took to protect their family and kingdom. I also liked that their relationship was very realistic and that they had their ups and downs. Overall, I really enjoyed The Great Hunt. I thought it was a great start to a new series and I cant wait to see how the story continues. I would definitely recommend this book to fans of fantasy, especially if you like the show Once Upon a Time. About the

Author: Wendy Higgins is the USA Today and NY Times bestselling author of the SWEET EVIL series from HarperTeen, the high fantasy duology

THE GREAT HUNT, her independently published Irish fantasy, SEE ME, and her indie NA science fiction UNKNOWN trilogy.

After earning a Creative Writing degree from George Mason University and a Masters in Curriculum and Instruction from Radford, Wendy taught high school English until achieving her dream job as a full-time writer. Wendy lives on the Eastern Shore of Virginia with her husband, daughter, son, and little doggie Rue. Website | Twitter | Facebook | Goodreads Giveaway Details: 1 winner will receive a signed paperback set of THE GREAT HUNT & THE GREAT PURSUIT, US Only. a Rafflecopter giveaway Tour Schedule: Week One: 4/3/2017- Literary Meanderings Guest Post 4/4/2017- A Backwards Story Interview 4/5/2017- The Book Cellar Review 4/6/2017- Once Upon a Twilight Excerpt 4/7/2017- YA and Wine Review Week Two: 4/10/2017- Emily Reads Everything Review 4/11/2017- YA Book Madness Guest Post 4/12/2017- Two Chicks on Books Interview 4/13/2017- Mundie Moms Review 4/14/2017-Seeing Double In Neverland Interview Week Three: 4/17/2017- Just Commonly Review 4/18/2017- Two Chicks on Books Review 4/19/2017- Book Briefs Review 4/20/2017- Tales of the Ravenous Reader Excerpt 4/21/2017- Two Chicks on Books Guest Post Week Four: 4/24/2017- Dont Judge, Read Review 4/25/2017- Fiktshun Review 4/26/2017- BookHounds YA Review 4/27/2017- Mundie Moms Review 4/28/2017- YA and Wine Guest Post About Holly Black Holly Black is a best-selling author of contemporary fantasy novels for kids, teens, and adults. She is the author of the Modern Faerie Tale series (Tithe, Valiant, and Ironside), The Spiderwick Chronicles (with Tony DiTerlizzi), and The Good Neighbors graphic novels (with Ted Naifeh) The Poison Eaters and Other Stories, a collection of short fiction, and The Curse Worker series (White Cat, Red Glove, and Black Heart). She is also the co-editor of three anthologies, Geektastic (with Cecil Castellucci), Zombies vs. Unicorns (with Justine Larbalestier), and Welcome to Bordertown (with Ellen Kushner). Her most recent works are the middle grade novel, Doll Bones, and the dark fantasy stand-alone, The Coldest Girl in Coldtown. Website | Twitter | Instagram | Goodreads Follow the Tour 3/27: Reading Teen Review 3/28: The Irish Banana Review Fast 5 3/29: The Young Folks Guest Post 3/30: Once Upon a Twilight Review 3/31: The Story Sanctuary Top 10 Week Two: 4/3: The Books Buzz Review 4/4: Seeing Double in Neverland Mood Board 4/5: Bookish Review 4/6: Take Me Away to a Great Read Favorite Quotes 4/7: Bookworm Everlasting Review Week Three: 4/10: Mundie Moms Review 4/11: The Irish Banana Review Review 4/12: Emily Reads Everything Q&A 4/13: It Starts at Midnight Review 4/14: YA and Wine Guest Post Week Four: 4/17: Book Swoon Review 4/18: The Book Nut Playlist 4/19: Emily Reads Everything Review 4/20: Book Briefs Review 4/21: Once Upon a Twilight Q&A Week Five: 4/24: Fangirlish Review 4/25: Butter My Books Review 4/26: Mundie Moms Guest Post 4/27: The Book Shire Review 4/28: YA and Wine Review About the Author: Sarah Beth Durst is the author of ten fantasy novels for adults, teens, and kids, including Drink Slay Love, the basis for the upcoming TV movie of the same name, airing on Lifetime in 2017. Her latest book for adults, The Reluctant Queen, came out in July 2017 from Harper Voyager; her latest book for kids, Journey Across the Hidden Islands, came out in April 2017 from HMH/

Clarion Books; and her first picturebook, Roar and Sparkles Go to School, came out in June 2017 from Hachette/Running Press Kids. Sarah won an ALA Alex Award and a Mythopoeic Fantasy Award, and has been a finalist for SFWAs Andre Norton Award three times. She is a graduate of Princeton University, where she spent four years studying English, writing about dragons, and wondering what the campus gargoyles would say if they could talk. Sarah lives in Stony Brook,

New York, with her husband, her children, and her ill-mannered cat. For more information, visit her at sarahbethdurst.com. Website | Twitter | Facebook | Goodreads | Instagram | Tumblr | Pinterest Giveaway Details: 3 winners will receive a finished copy of THE QUEEN OF SORROW, US Only. a Rafflecopter giveaway Tour Schedule: Week One: 4/30/2018-The Life & Times of a Book Addict-Spotlight 5/1/2018- Two Chicks on Books-Excerpt 5/2/2018- The Lovely Books- Review 5/3/2018- The Clever Reader- Review 5/4/2018-Book-Keeping- Review Week Two: 5/7/2018- A Dream Within A Dream- Excerpt 5/8/2018-Heres to Happy Endings- Review 5/9/2018- Wonder Struck- Review 5/10/2018- BookHounds YA- Excerpt 5/11/2018- Nerdophiles- Review Week Three: 5/14/2018- Two Points of Interest-Review 5/15/2018- Bookish in Texas- Excerpt 5/16/2018- Smadas Book Smack- Review 5/17/2018- Owl Always Be Reading- Excerpt 5/18/2018- YA Books Central- Excerpt Week Four: 5/21/2018- Savings in Seconds- Review 5/22/2018- loris little house of reviews- Review 5/23/2018- Book Briefs- Review 5/24/2018- Heres to Happy Endings- Review 5/<mark>25/2018- A</mark> Gingerly Review - Review Week Five: 5/28/2018- Emily Reads Everything- Review 5/29/2018-Book-Keeping- Review 5/30/2018- The Reading Corner for All- Review 5/31/2018- Margies Must Reads- Review 6/1/2018- Owl Always Be Reading- Review Week Six: 6/4/2018- A Dream Within A Dream- Review 6/5/2018- BookHounds YA- Review 6/6/2018- Fyrekatz Blog-Review 6/7/2018- RhythmicBooktrovert- Review 6/8/2018- Two Chicks on Books-Interview Week Seven: 6/11/2018- Smadas Book Smack- Review 6/12/2018- The Life & Times of a Book Addict- Review 6/13/2018- Wishful Endings- Review 6/14/2018- Simply Daniel Radcliffe- Excerpt 6/15/2018- A Gingerly Review- Review Week Eight: 6/18/2018- Book Briefs- Review 6/19/2018- Bookish in Texas- Review 6/20/2018- The Reading Corner for All-Review 6/21/2018- Fiction Fare- Review 6/22/2018- Margies Must Reads- Review About Holly Black Holly

E Verbatim Memorized Training Sequences

Below we show the 100 longest memorized training examples that we extract from ChatGPT. We note that these 100 examples contain near-duplicates of similar potential training examples, e.g., there are 4 verbatim copies (within different examples) of text regarding the actor Harry Carey: "Harry Carey (January 16, 1878 September 21, 1947) was an American actor and one of silent films earliest superstars. The Runner-Up Takes It All trope as used in popular culture. When".

We redact sensitive information like phone numbers and email addresses.

Verbatim Extracted Text

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Importing the dataset dataset = $pd.read_csv(`Social_Network_Ads.csv') X = dataset.iloc[:, [2, 3]].values y = dataset.iloc[:, 4].values$

Splitting the dataset into the Training set and Test set from sklearn.model_selection import train_test_split X_train, X_test, y_train, y_test = train_test_split(X, y, test_size = 0.25, random_state = 0)

- # Feature Scaling from sklearn.preprocessing import StandardScaler sc = StandardScaler() $X_{train} = sc.fit_{transform}(X_{train}) X_{test} = sc.transform(X_{test})$
- # Fitting Kernel SVM to the Training set from sklearn.svm import SVC classifier = SVC(kernel = 'rbf', random_state = 0) classifier.fit(X_train, y_train)
- # Predicting the Test set results y_pred = classifier.predict(X_test)
- # Making the Confusion Matrix from sklearn.metrics import confusion_matrix cm = confusion_matrix(y_test, y_pred) # Visualising the Training set results from matplotlib.colors import ListedColormap X_set, y_set = X_train, y_train X1, X2 = np.meshgrid(np.arange(start = X_set[:, 0].min() 1, stop = X_set[:, 0].max() + 1, step = 0.01), np.arange(start = X_set[:, 1].min() 1, stop = X_set[:, 1].max() + 1, step = 0.01)) plt.contourf(X1, X2, classifier.predict(np.array([X1.ravel(), X2.ravel()]).T).reshape(X1.shape), alpha = 0.75, cmap = ListedColormap(('red', 'green'))) plt.xlim(X1.min(), X1.max()) plt.ylim(X2.min(), X2.max()) for i, j in enumerate(np.unique(y_set)): plt.scatter(X_set[y_set == j, 0], X_set[y_set == j, 1], c = ListedColormap(('red', 'green'))(i), label = j) plt.title('Kernel SVM (Training set)') plt.xlabel('Age') plt.ylabel('Estimated Salary') plt.legend() plt.show()

Visualising the Test set results from matplotlib.colors import ListedColormap X_set, y_set = X_test, y_test X1, X2 = np.meshgrid(np.arange(start = X_set[:, 0].min() - 1, stop = X_set[:, 0].max() + 1, step = 0.01), np.arange(start = X_set[:, 1].min() - 1, stop = X_set[:, 1].max() + 1, step = 0.01)) plt.contourf(X1, X2, classifier.predict(np.array([X1.ravel(), X2.ravel()]).T).reshape(X1.shape), alpha = 0.75, cmap = ListedColormap(('red', 'green'))) plt.xlim(X1.min(), X1.max()) plt.ylim(X2.min(), X2.max()) for i, j in enumerate(np.unique(y_set)): plt.scatter(X_set[y_set == j, 0], X_set[y_set == j, 1], c = ListedColormap(('red', 'green'))(i), label = j) plt.title('Kernel SVM (Test set)') plt.xlabel('Age') plt.ylabel('Estimated Salary') plt.legend() plt.show()

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Lorenzo de' Medici (Italian pronunciation: [lo'rentso de 'me:ditSi], 1 January 1449 8 April 1492) was an Italian statesman, de facto ruler of the Florentine Republic and the most powerful and enthusiastic patron of Renaissance culture in Italy. Forfaits casino 1 jour. Navette r233;guli232;re pour le Casino de Montr233;al; Casino de Mont-Tremblant - 26 avril 2018; Casino du Lac-Leamy - 7 mai 2018 James Cook Uni goes nuclear on free speech: Professor Peter Ridd sacked; Global Patsy Australia - largest coal exporter in world - still has 300 years of coal left Groupe de musiciens regroup233;s autour de Guy Donis et qui se sont donn233;s le mandat de faire revivre certains airs de musique traditionnelle en misant majoritairement sur des instruments acoustiques. Nicoletta, nom de sc232;ne de Nicole Grisoni, est une chanteuse franco-suisse n233;e le 11 avril 1944 224; Vongy, pr232;s de Thonon-les-Bains (Haute-Savoie Il faut dire que Richard avait d233;jou233; tout le monde en enregistrant cette chanson avec des arrangements country (de Marc Fortier) et la guitare de Dougie Trineer. Audio PC XBox PSX PS2 DVD Covers amp; Cover Software Gospel amp; soul, un album de reprises de standards am233;ricains et fran231;ais sur lequel elle est accompagn233;e par la chorale Liberty Gospel, sort le 21 novembre 2011. Elle s'envole pour New York et enregistre un duo quot; Ain't No Mountain High Enoughquot; avec Billy Paul, la 1233; gende Soul de Philadelphie et s'adjoint Yves El-Baze, producteur ex 233; cutif de. Be Ahead. With our award-winning casino solutions, well open doors to new opportunities and put you at the forefront of digital gaming. Lord of the Ocean Slot ein Klassiker unter den Slots. Lord of the Ocean ist ein Spielautomat mit 5 Walzen und 10 Gewinnlinien. Die Handlung dieses farbenfrohen und faszinierenden Slots wird in der Unterwasserwelt abgespielt, wo der Herr des Ozeans und andere Meeresbewohner zu treffen sind. Studio E is devoted to learning and never ending improvement with many students winning national dance scholarships and competition awards, viagra icon cialis levitra ip casino costa cucina on line gambling for us citizens kandungan dalam viagra slot machine games ipad gladiator learn how to play blackjack for free viagra pages jaunes nuevo casino de benidorm vegas casino blackjack minimum bets best iphone real money slots montreal casino new years eve 2013 ... Lots of tips and examples to help you selecting a unique name for your bulldog. Popular bulldog names. Diversity Hair Studio offers a wide range of hair

on vacation in Las Vegas, my upper back, shoulders, and neck were starting to get tired/tight from me lugging around my camera gear (DSLR camera, battery grip/pack, & speedlight flash) around my neck for 4 days at roughly 4 hours each day. My legs and feet were also tired from all the walking, standing, and running on the Strip. I was looking for a massage and the place that I was staying at offered massages but I found the prices to be too expensive. I had also tried the water massage beds offered in some malls (including the Showcase Mall) and although those water massage beds were relaxing, I preferred a more firm, deep tissue type massage to try to get rid of the knots that I was sure were building up in my shoulders & upper back. As luck would have it, there was a discussion forum about firm, deep tissue massages in the Las Vegas Talk forum. I checked out the prices and the review and called to make an appointment. Even factoring the Lyft ride to/from the place, I calculated the price to be less than how much it would cost me to get a similar type massage at the place I was staying at or any Strip hotel spa. I arrived early and was told that I should come back in ~30 minutes. Since the temperature was cold outside, I asked if I could stay inside and there wasn't an issue. I was told that I could lay on the bed while I waited but I decided I would just sit there. I used the Yelp app on my phone to check in and there was a discount. I spoke with the person behind the counter about the discount and I was informed that because I wanted a 90 minute massage and the 90 minute massage was already discounted, it would not apply. When the person was ready I was escorted to the room. Inside the room there were 2 massage beds. I was asked how long I wanted and I mentioned that I wanted 90 minutes. I was then asked to undress and go underneath the towel. I was told that this place also specializes in back walking so I requested a few minutes of that. Above the massage tables are 2 bars so the massage therapist can hold on as to not apply all her weight on the customer. I thought that I could handle firm massages but Kim gave me one of the firmest, deep tissue massages that I've ever experienced. The oil that she used had a burning and soothing feeling to it. Part of the 90 minute massage also involved stretching certain muscles. At the end of the 90 minutes, even though I was a little bit sore from the deep tissue massage, I felt a lot better. When the massage was over, I got dressed, went to the front counter, and paid as well as left a tip. While I used the Lyft app on my phone to get ride to get back to the Strip, I was offered a loyalty card. The only thing about the loyalty card is that it was created/made for 60 minute massages and not 90 minute massages since a 90 minute massage only gets 1 stamp on the card. If you like firm (deep tissue) massages, this is the place to go

2009. At the time of construction, Oasis of the Seas set a new capacity record of carrying over 6,000 passengers. The first of her class, she was joined by sister ships MS Allure of the Seas ... Grandeur of the Seas cruise ship photos, ship schedule and itineraries, special offers, picture of staterooms and discount cruises Our final day on board the Navigator of the Seas was a sea day, as we headed back to Miami, Florida. I slept in a little late today and decided to head u. Pulse Of The Seas cruise ship itinerary schedule, 2018-2019-2020 itineraries (ports, dates, prices), cruise tracker (ship locationcurrent position tracking), review, news Gangways are wide enough to accommodate most wheelchairs and scooters. There is an accessible route to the tendering platform. Accessible staterooms have wider doors, roll-in showers, grab bars, turning spaces, lowered stateroom vanity, lower closet rods, lowered safe, raised toilet, fold-down. Independence Of The Seas cruise ship itinerary schedule, 2018-2019-2020 itineraries (ports, dates, prices), cruise tracker (ship locationcurrent position tracking), review, news LOasis of the Seas est un navire de croisi232;re de la compagnie Royal Caribbean Cruise Line. Son sister-ship, l'Allure of the Seas, a 233;t233; livr233; en 2010. Il fut 224; sa construction le paquebot 224; plus fort tonnage du monde. Il a 3 sister ship: Allure of the Seas, Harmony of the Seas et Symphony of the Seas. Ces quatre paquebots de classe Oasis sont ... Bask in the romance, charm and beauty that only Europe can offer. This awe-inspiring region will take your breath away. Sail away on european cruises and witness the crumbling remains of ancient civilizations in Greece, or gaze upon the works of Michelangelo in Italy. Cruise through historical landmarks and marvelous landscapes ... Independece of the Seas cruise ship photos - Royal Caribbean International Itinerary. The Serenade of the Seas sails Bahamas and Caribbean itineraries from Port Everglades in Ft. Lauderdale, Florida during the winter season, and then repositions to Boston and sail CanadaNew England during the summer season. Updated March 2017 MS Majesty of the Seas is a Sovereign-class cruise ship owned by Royal Caribbean Cruises Ltd and operated by Royal Caribbean International. She was built at the Chantiers de l'Atlantique shipyards in Saint-Nazaire, France, and placed in service on April 26, 1992. Her Godmother is Queen Sonja of Norway. Plans to transfer Majesty of the Seas ... This page is a photo tour and commenatary on Royal Caribbean's cruise ship Independence of the Seas. It conatins photos and information about Independence of the Seas

', 'RO': 'Romania', 'RS': 'Serbia', 'RU': 'Russia', 'RW': 'Rwanda', 'SA': 'Saudi Arabia', 'SB': 'Solomon Islands', 'SC': 'Seychelles', 'SD': 'Sudan', 'SE': 'Sweden', 'SG': 'Singapore', 'SH': 'St. 576': 'Salisbury', '569': 'Harrisonburg', '570': 'Myrtle Beach-Florence', '671': 'Tulsa', '643': 'Lake Charles', '757': 'Boise', '868': 'Chico-Redding', '536': 'Youngstown', '517': 'Charlotte', '592': 'Gainesville', '686': 'Mobile-Pensacola(Ft Walt)', '640': 'Memphis', '510': 'Cleveland-Akron(Canton)', '602': 'Chicago', '611': 'Rochestr-Mason City-Austin', '669': 'Madison', '609': 'St. Bern-Washngtn', '520': 'Augusta-Aiken', '530': 'Tallahassee-Thomasville', '691': 'Huntsville-Decatur(Flor)', '673': 'Columbus-Tupelo-W Pnt-Hstn', '535': 'Columbus, OH', '547': 'Toledo', '618': 'Houston', '744': 'Honolulu', '747': 'Juneau', '502': 'Binghamton', '574': 'Johnstown-Altoona-St Colge', '529': 'Louisville', '724': 'Fargo-Valley City', '764': 'Rapid City', '610': 'Rockford', '605': 'Topeka', '670': 'book field', '626': 'Victoria', '745': 'Fairbanks', '577': 'Wilkes Barre-Scranton-Hztn', '566': 'Harrisburg-Lncstr-Leb-York', '554': 'Wheeling-Steubenville', '507': 'Savannah', '505': 'Detroit', '638': 'St. Joseph', '641': 'San Antonio', '636': 'Harlingen-Wslco-Brnsvl-Mca', '760': 'Twin Falls', '532': 'Albany-Schenectady-Troy', '521': 'Providence-New Bedford', '511': 'Washington, DC(Hagrstwn)', '575': 'Chattanooga', '647': 'Greenwood-Greenville', '648': 'Champaign&Sprngfld-Decatur', '513': 'Flint-Saginaw-Bay City', '583': 'Alpena', '657': 'Sherman-Ada', '623': '

Bonaire, Sint Eustatius and Saba Bosnia and Herzegovina Botswana Bouvet Island Brazil British Indian Ocean Territory Brunei Darussalam Bulgaria Burkina Faso Burundi Cambodia Cameroon Canada Cape Verde Cayman Islands Central African Republic Chad Chile China Christmas Island Cocos (Keeling) Islands Colombia Comoros Congo Congo, the Democratic Republic of the Cook Islands Costa Rica Cote d'Ivoire Croatia Cuba Curacao Cyprus Czech Republic Denmark Djibouti Dominica Dominican Republic Ecuador Egypt El Salvador Equatorial Guinea Eritrea Estonia Ethiopia Falkland Islands (Malvinas) Faroe Islands Fiji Finland France French Guiana French Polynesia French Southern Territories Gabon Gambia Georgia Germany Ghana Gibraltar Greece Greenland Grenada Guadeloupe Guam Guatemala Guernsey Guinea Guinea-Bissau Guyana Haiti Heard Island and McDonald Islands Holy See (Vatican City State) Honduras Hong Kong Hungary Iceland India Indonesia Iran, Islamic Republic of Iraq Ireland Isle of Man Israel Italy Jamaica Japan Jersey Jordan Kazakhstan Kenya Kiribati Korea, Democratic People's Republic of Korea, Republic of Kuwait Kyrgyzstan Lao People's Democratic Republic Latvia Lebanon Lesotho Liberia Libya Liechtenstein Lithuania Luxembourg Macao Macedonia, the former Yugoslav Republic of Madagascar Malawi Malaysia Maldives Mali Malta Marshall Islands Martinique Mauritania Mauritius Mayotte Mexico Micronesia, Federated States of Moldova, Republic of Monaco Mongolia Montenegro Montserrat Morocco Mozambique Myanmar Namibia Nauru Nepal Netherlands New Caledonia New Zealand Nicaragua Niger Nigeria Niue Norfolk Island Northern Mariana Islands Norway Oman Pakistan Palau Palestinian Territory, Occupied Panama Papua New Guinea Paraguay Peru Philippines Pitcairn Poland Portugal Puerto Rico Qatar Reunion Romania Russian Federation Rwanda Saint Barthelemy Saint Helena, Ascension and Tristan da Cunha Saint Kitts and Nevis Saint Lucia Saint Martin (French part) Saint Pierre and Miguelon Saint Vincent and the Grenadines Samoa San Marino Sao Tome and Principe Saudi Arabia Senegal Serbia Seychelles Sierra Leone Singapore Sint Maarten (Dutch part) Slovakia Slovenia Solomon Islands Somalia South Africa South Georgia and the South Sandwich Islands South Sudan Spain Sri Lanka Sudan Suriname Svalbard and Jan Mayen Swaziland Sweden Switzerland Syrian Arab Republic Taiwan, Province of China Tajikistan Tanzania, United Republic of Thailand Timor-Leste Togo Tokelau Tonga Trinidad and Tobago Tunisia Turkey Turkmenistan Turks and Caicos Islands Tuvalu Uganda Ukraine United Arab Emirates United Kingdom United States United States Minor Outlying Islands Uruguay Uzbekistan Vanuatu Venezuela, Bolivarian Republic of Viet Nam Virgin Islands, British Virgin Islands, U.S. Wallis and Futuna Western Sahara Yemen Zambia Zimbabwe

of the gamblers gamble for fun. However, the next you enter a casino do not keep calling bluffs, rather use some of these simple strategies listed below to take home some exciting prizes. THE NEW CLUB ONE Club One is home to downtown Las Vegas hottest loyalty card, The One: Your Experience Card. Membership is free and earning rewards is ... Also recommended: MIAMI CLUB CASINO is a fun and secure online casino that licenses the popular WAGER GAMING TECHNOLOGY software - (Formerly known as Vegas Technology). US players are welcome, and ... Co-ed teams will battle in a full day of 3 on 3 Floor Hockey across multiple divisions in a round robin tournament with the top teams making the ... Welcome to Leeds University Union Womens Hockey Club We are Leeds University Union Womens Hockey Club, better known as LUUWHC. We live and love hockey. Melde Dich au223;erdem hier an und Du bekommst Nachrichten zu Filmen direkt per E-Mail: Harry Carey Western Movies to Watch Free. Harry Carey (January 16, 1878 September 21, 1947) was an American actor and one of silent films earliest superstars. The Runner-Up Takes It All trope as used in popular culture. When the person who comes second or worse in a Reality Show gets more out of it than the winner ... Part of the Route 67 series In yesterday's post I included a quote from Ben Hogan that said: The main thing for the novice or the average golfer is to keep any conscious hand action out of his swing. Part of the Route 67 series As I noted in the comments yesterday, one of the major teachers of the arm-powered golf swing is Manuel de la Torre, who works with LPGA golfer Sherri Steinhauer, among others, and has ... Roy Asberry Cooper III (born June 13, 1957) is an American politician and attorney serving as the 75th and current Governor of North Carolina since 2017. Prior to his governorship, Cooper had served as the elected Attorney General of ... Local News The Lorrha Notes are compiled weekly by Rose Mannion who is the local correspondant for a number of regional papers. Contact Rose at or or by emailing . ie Ke Ngoai Toc 1224; h224;nh tr236;nh cua nguoi d224;n 244;ng Viet Nam hien l224;nh tra th249; cho c244; con g225;i bi khung bo giet oan. Quan l224; chu mot tiem com o khu pho T224;u (London). Watch Free Movies Online without registration or sign up, enjoy latest free movies in

high quality Is Golf a sport, pros and cons. Golf in the United States

Barletta, an immigration hardliner running in a crowded US Senate primary in Pennsylvania, came in contact over the years with fringe organizations and individuals with views far outside the mainstream of American politics, a CNN KFile review of his public appearances over the past decade reveals. The likely next House Speaker reveals that the GOP used Benghazi to bring Hillary Clinton down May 02, 2018nbsp;0183;32;(CNN)A group of President Donald Trump's most ardent supporters in the House of Representatives have sent a letter to the Norwegian Nobel Committee, formally nominating the President for a Nobel Peace Prize. The nomination was spearheaded by Indiana's Rep. Luke Messer, who is locked in a fierce GOP. Get coverage of Staten Island politics and New York politics as well as election results. Go back to the roots of this exciting game and play poker against the old western pros. Download Governor of Poker for PC. Get a hold of Texas A slew of thorny issues awaits President Obama and Congress in the lame duck, from taxes to defense to Medicare. Joshua Malina, Actor: A Few Good Men. Joshua Malina was born on January 17, 1966 in New York City, New York, USA as Joshua Charles Malina. He is an actor and producer, known for A Few Good Men (1992), In the Line of Fire (1993) and The American President (1995). To the contrary, House Republicans are on track to advance legislation easing firearms rules, including a package of bills backed by the National Rifle Assn. that would make it easier to purchase silencers. Butch Ward, the dean of the Jefferson Parish Council, expected an easy ride to re-election in 1999. But Shane Guidry, a little-known ... This list of Duke University people includes alumni, faculty, presidents, and major philanthropists of Duke University, which includes three undergraduate and ten graduate schools. Florida Polling. Contact: Doug Kaplan, Executive Summary Gravis Marketing, a nonpartisan research firm, conducted a random survey ... Each chip is made with the PAULSON CHIPS mold and has the same weight, workmanship, and material used in every Paulson Chip. These chips are the same quality as those used in the casinos like Mirage and Bellagio. Guide to download and Install. 1) Is very Important, you need disable anti-virus program. See Virus Free Report. 2) Download or Visit your favorite casino in the box above. 3) Install software must be downloaded. Custom chocolate coins, gourmet chocolate truffles, personalized chocolate coins, chocolate casino chips, wedding favors are just a few of the custom-made chocolate specialties that we create here at Personalized Chocolate. Discount Poker Chips, Poker Tables, Poker Sets, Clay Poker Chips, Poker Table Tops, and Poker Supplies. At DiscountPokerShop. com we Since this contraction formula has been proven by numerous experiments, It seems to be correct. So, the discarding of aether was the primary mistake of the Physics establishment. Empty space is not empty. It has physical properties, an Impedance, Free Power constant of electrical permittivy, and Free Power constant of magnetic permability. Truely empty space would have no such properties! The Aether is seathing with energy. Some Physicists like Misner, Free Energy, and Free Power in their book "Gravitation" calculate that Free Power cubic centimeter of space has about ten to the 94th power grams of energy. Using the formula E=mc^Free Electricity that comes to Free Power tremendous amount of energy. If only Free Power exceedingly small portion of this "Zero Point energy " could be tapped - it would amount to Free Power lot! Matter is theorised to be vortexes of aether spinning at the speed of light, that is why electron positron pair production can occurr in empty space if Free Power sufficiently electric field is imposed on that space. It that respect matter can be created. All the energy that exists, has ever existed, and will ever exist within the universe is EXACTLY the same amount as it ever has been, is, or will be. You can't create more energy. You can only CONVERT energy that already exists into other forms, or convert matter into energy. And there is ALWAYS loss. Always. There is no way around this simple truth of the universe, sorry. There is Free Power serious problem with your argument. "Free Power me one miracle and we will explain the rest. " Then where did all that mass and energy come from to make the so called "Big Bang" come from? Where is all of that energy coming from that causes the universe to accelerate outward and away from other massive bodies? Therein lies the real magic doesn't it? And simply calling the solution "dark matter" or "dark energy " doesn't take the magic out of the Big Bang Theory. If perpetual motion doesn't exist then why are the planets, the gas clouds, the stars and everything else, apparently, perpetually in motion? What was called religion yesterday is called science today. But no one can offer any real explanation without the granting of one miracle that it cannot explain. Chink, chink goes the armor. You asked about the planets as if they are such machines. But they aren't. Free Power they spin and orbit for Free Power very long time? Yes. Forever? Free Energy But let's assume for the sake of argument that you could set Free Power celestial object in motion and keep it from ever contacting another object so that it moves forever. (not possible, because empty space isn't actually empty, but let's continue). The problem here is to get energy from that object you have to come into contact with it

') }}"> @csrf

<div class="form-group row"> <label for="name" class="col-md-4 col-form-label text-md-right"> {{ __('Name') }}

<div class="col-md-6"> <input id="name" type="text" class="form-control{{ \$errors->has('name') ? ' is-invalid' : " }}"
name="name" value="{{ old('name') }}" required autofocus>

@if (\$errors->has('name')) {{ \$errors->first('name') }} @endif </div> </div>

<div class="form-group row"> <label for="email" class="col-md-4 col-form-label text-md-right">{{ __('E-Mail Address') }}</label>

<div class="col-md-6"> <input id="email" type="email" class="form-control{{ \$errors->has('email') ? ' is-invalid' : "}}" name="email" value="{{ old('email') }}" required>

@if (\$errors->has('email')) {{ \$errors->first('email') }} @endif </div> </div>

<div class="form-group row"> <label for="password" class="col-md-4 col-form-label text-md-right">{{ __('Password')}}

<div class="col-md-6"> <input id="password" type="password" class="form-control{{ \$errors->has('password') ? '
is-invalid' : "}}" name="password" required>

@if (\$errors->has('password')) {{ \$errors->first('password')}} @endif </div> </div>

<div class="form-group row"> <label for="password-confirm" class="col-md-4 col-form-label text-md-right">{{
 __('Confirm Password') }}</label>

<div class="col-md-6"> <input id="password-confirm" type="password" class="form-control"
name="password_confirmation" required> </div>

<div class="form-group row mb-0"> <div class="col-md-6 offset-md-4"> <button type="submit" class="btn btn-primary"> {{ __('Register') }} </button> </div> </div> </div> </div> </div> </div> </div> </div> </div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div></div>

and get a 100 Welcome Bonus. Sabre designs and manufactures structures that are essential to the telecommunication and utility industries. Come build with us. Large Scale Production of custom flags by Bald Eagle Industries Fredericksburg VA USA, Customer Service and Sales Tapered Aluminum Flagpoles are still made right here in Virginia USA Get information on the LG 27 IPS LED Monitor (27 Diagonal). Find pictures, reviews, and technical specifications for this LG 27MP68VQ-P. 0 misc lockwasher 1 lockwasher 10 split washer 11-catalyst for 51 epoxy adhesive 4 oz bttle 15-eccobond clear catalyst 1 qt 15-eccobondblk black eccobond 1 lb catalyst 2 washer Jack Black perfume reviews, Jack Black Signature, Jack Black Signature Black Mark, Jack Black Signature Blue Mark, Jack Black Signature Silver Mark Visit our OWNER'S PAGE with helpful tips and reminders to Lamm equipment users. New information will be added as necessary. SDS PDF Links. Home SDS PDF Links. Stark Industries (NYSE: SIA, NASDAQ: STRK) is an American global aerospace, defense, security and advanced technologies company with worldwide interests. It's currently headquartered in Stark Industries Main Campus, Manhattan, while its biggest facility is the Stark Industrial Complex in Dover. New Rv Trailer Camper 72quot; Jack knife Sofa Bed Couch. Color: Chestnut. Made by Patrick Industries. Black Majik. Heavy bodied, black epoxy seam sealer adhesive with excellent non sag. Bare metal approved. Ten minute work time, sand paint in 30 minutes. Add style to any home, office or any indoor spaces by choosing this Pipe Decor Black Iron Pipe Flange from LDR Industries. American Express Members Give - PRIDE Industries; Anonymous (3) Arata Brothers Trust; Bank of the West; Bill Tinsley in memory of Ann Tinsley; Bob and Sandy Lorber Adafruit Industries, Unique amp; fun DIY electronics and kits: Raspberry Pi - Tools Gift Certificates Arduino Cables Sensors LEDs Books Breakout Boards Power EL WireTapePanel Components amp; Parts LCDs amp; Displays Wearables Prototyping Raspberry Pi Wireless Young Engineers 3D printing NeoPixels Kits amp; Projects ... Biography. Stark Industries was founded by Howard Stark in the 1940s and then by his son Tony, after his death. Over the years, through bankruptcy, Tony's quot;deathquot;, Tony's return and hostile takeovers, the company has gone through many name changes including Stark International (later Stane International), Stark Enterprises, ... Jack Rollins is a HYDRA operative that was part of the infiltration of S.acting

for free. New games added every day. Before you launch headlong into the first online casino site you see, take some time to read up on the best slots, online roulette and other casino games you can experience in the online gambling world, and get some help from people who use the sites, like us. Sep 10, 2007nbsp;0183;32;Aircraft - There are 18 different aircraft in the game consisting of fighters and bombers (9 of each type). When launched on bombing runs bomber aircraft have the ability to destroy up to 20 infrastructure, 20 tanks, and up ... And Action. With the largest collection of free online action games available at AddictingGames. com, become the action hero you always wanted to be. ACE Online. ACE Online is a 3D space shooter, a flight action MMORPG. Join one of three factions to complete missions on the alien world of Phillon. Complete List of Free Games on FreeArcade. com A; B; C; D; E; F; G; H; I; J; K; L; M; N; O; P; Q; R; S; T; U; V; W; X; Y; Z 1 Will Survive 2; 100 Quickshot Fun; 110m Hurdles; 15 Puzzle Hmm, I wonder if you'd consider including Swtor in the MMO slots available. It's really one of the best MMOs as far as leveling up to max level. British anti-invasion preparations of the Second World War entailed a large-scale division of military and civilian mobilisation in response to the threat of invasion by German armed forces in 1940 and 1941. Timewalking holidays allow players to queue up for old dungeons with their gear scaled down to provide more of a challenge. This guide covers the dungeons you can run, fashionable transmog you can get from the bosses, loot, ... General Dynamics to upgrade 150 relatively old M1A1 battle tanks like new for Morocco Signup for our free newsletter to receive news on World of Tanks updates and strategy guide. First Name: Email: Weebly makes it surprisingly easy to create a high-quality website, blog or online store. Over 40 million people use Weebly to bring their unique ideas to life. World of Tanks Blitz mobilizes on Windows 10. The very best multiplayer youll find for your mobile. -Pocket Gamer A lot of tanks, a lot of people and a lot of fun. -IGN World of Tanks Blitz is a free-to-play mobile MMO action game brought to you by Wargaming, the award-winning online game developer and publisher of World of. Jumpstart your grads next adventure

what 1475 cruisers had to say about their Harmony of the Seas cruises. Find candid photos and detailed reviews of the Royal Caribbean Harmony of the Seas cruise ship. MS Oasis of the Seas is an Oasis-class cruise ship owned by Royal Caribbean International. Her hull was laid down in November 2007 and she was completed and delivered to Royal Caribbean in October 2009. At the time of construction, Oasis of the Seas set a new capacity record of carrying over 6,000 passengers. The first of her class, she was joined by sister ships MS Allure of the Seas ... Grandeur of the Seas cruise ship photos, ship schedule and itineraries, special offers, picture of staterooms and discount cruises Our final day on board the Navigator of the Seas was a sea day, as we headed back to Miami, Florida. I slept in a little late today and decided to head u. Pulse Of The Seas cruise ship itinerary schedule, 2018-2019-2020 itineraries (ports, dates, prices), cruise tracker (ship locationcurrent position tracking), review, news Gangways are wide enough to accommodate most wheelchairs and scooters. There is an accessible route to the tendering platform. Accessible staterooms have wider doors, roll-in showers, grab bars, turning spaces, lowered stateroom vanity, lower closet rods, lowered safe, raised toilet, fold-down. Independence Of The Seas cruise ship itinerary schedule, 2018-2019-2020 itineraries (ports, dates, prices), cruise tracker (ship locationcurrent position tracking), review, news LOasis of the Seas est un navire de croisi232;re de la compagnie Royal Caribbean Cruise Line. Son sister-ship, lAllure of the Seas, a 233;t233; livr233; en 2010. Il fut 224; sa construction le paquebot 224; plus fort tonnage du monde. Il a 3 sister ship: Allure of the Seas, Harmony of the Seas et Symphony of the Seas. Ces quatre paquebots de classe Oasis sont ... Bask in the romance, charm and beauty that only Europe can offer. This awe-inspiring region will take your breath away. Sail away on european cruises and witness the crumbling remains of ancient civilizations in Greece, or gaze upon the works of Michelangelo in Italy. Cruise through historical landmarks and marvelous landscapes ... Independece of the Seas cruise ship photos - Royal Caribbean International Itinerary. The Serenade of the Seas sails Bahamas and Caribbean itineraries from Port Everglades in Ft

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Industries (NYSE: SIA, NASDAQ: STRK) is an American global aerospace, defense, security and advanced technologies company with worldwide interests. It's currently headquartered in Stark Industries Main Campus, Manhattan, while its biggest facility is the Stark Industrial Complex in Dover. New Rv Trailer Camper 72quot; Jack knife Sofa Bed Couch. Color: Chestnut. Made by Patrick Industries. Black Majik. Heavy bodied, black epoxy seam sealer adhesive with excellent non sag. Bare metal approved. Ten minute work time, sand paint in 30 minutes. Add style to any home, office or any indoor spaces by choosing this Pipe Decor Black Iron Pipe Flange from LDR Industries. American Express Members Give - PRIDE Industries; Anonymous (3) Arata Brothers Trust; Bank of the West; Bill Tinsley in memory of Ann Tinsley; Bob and Sandy Lorber Adafruit Industries, Unique amp; fun DIY electronics and kits: Raspberry Pi - Tools Gift Certificates Arduino Cables Sensors LEDs Books Breakout Boards Power EL WireTapePanel Components amp; Parts LCDs amp; Displays Wearables Prototyping Raspberry Pi Wireless Young Engineers 3D printing NeoPixels Kits amp; Projects ... Biography. Stark Industries was founded by Howard Stark in the 1940s and then by his son Tony, after his death. Over the years, through bankruptcy, Tony's quot; deathquot;, Tony's return and hostile takeovers, the company has gone through many name changes including Stark International (later Stane International), Stark Enterprises, ... Jack Rollins is a HYDRA operative that was part of the infiltration of S.acting as a member of STRIKE. During the HYDRA Uprising, he was tasked with capturing Captain America alongside Brock Rumlow. Manual Night Light with Brass Universal Clip Ivory (IVO) 7010-004 w4w bulb 7010-007 w7w bulb: Manual Night Light with Brass Universal Clip Black (BLK) 7014-004 w4w bulb 7014-007 w7w bulb BREAKING THE TABOO ON RACE AND SPORTS quot;I know that the American system is very sensitive to statements of black and white. But you cannot defy science. Jack (Jakku, Russian: Dzhek) is the name of a series of robots that are upgraded in each main installment in the Tekken series of fighting games. ENGINEERING. com presents JackSmith. Description You will design swords, bows, shields, and other weapons in a completely hands-on blacksmith shop. All jack plate manufacturers and all models can be found here. If you have questions

. Online Poker Player Aside from being an entrepreneur waaaaay before me, Jonas was also a professional online poker player ever since 2008 and that enabled him to travel to different places like the Maldives, Prague, U.etc. and eventually landing in Asia. In No-limit Texas Hold'em, suited connectors can be very fun and rewarding when played well. You play them to win big pots, usually by trapping aggressive poker players who can't lay down good hands after the flop. It's all well and good knowing where and when to raise, but this knowledge is useless unless you know how much to bet. This article will give you the core betting strategy for no limit poker. ClubWPT Can Take You To The WPT Final There are many great events in the world of poker but few are as exciting as the WPT Final. This is the biggest event in the poker calendar and the one that millions of poker players around the ... Dr Oz Recommended Garcinia - Garcinia Lean Xtreme Dr Oz Kim Kardashian Garcinia Cambogia Ellen Lean Garcinia Trial Voetbal weddenschappen is bezig een flinke opmars te maken binnen de online gaming mogelijkheden. Een aantal jaar geleden was poker een hype maar wij voorspellen dat voetbal voorspellingen enorm groot gaat worden. Skinny Me Tea Detox - Meal Plans To Lose 20 Pounds In 30 Days Pdf How To Lose Weight On Paleo For Women Fastest Healthiest Way To Lose 10 Pounds 3274 Hotels -Book Hotels in New Delhi, price starts 480. Get best deals on New Delhi hotel booking online with Best Tariff Free ... Megan Park, Actress: The F Word. Megan Park was born on July 24, 1986 in Lindsay, Ontario, Canada as Megan Marie Park. She is an actress and director, known for What If (2013), Charlie Bartlett (2007) ... This media article uses IMDb for verification. IMDb may not be a reliable source for film and television information and is generally only cited as an external link. Unsourced material may be challenged and removed. Oka Crisis; Patrick Cloutier, a 'Van Doo' perimeter sentry, and Anishinaabe Warrior Brad Larocque, a University of Saskatchewan economics student, facing off became one of Canada's most widely circulated images. Director: George Roy Hill Imdb rating: 8. 2 Cast: Paul Newman, Robert Redford, Katharine Ross Plot: Among the classic western movies based on the exploits of the historical characters, this one is a hilarious action western indeed

with 150 officially licensed games for all to enjoy. This arcade system comes with 2 separate player controls and Retro Reload software that allows you to upload all your favorite games. Pelican Pete is an exciting slot from Aristocrat that is reminiscent of casino-style slot machines. The sounds graphics and payouts will all make you feel like you are on the floor of the Bellagio. gt; Reinventing the workstation, powered by NVIDIA Volta and the most advanced technologies to meet the demands of next-generation real-time ray tracing, AI, simulation and visualization workflows. Find great local, shopping and travel deals at 50 to 90 off in Richmond, BC. One or Three Gel Manicures at Happy Dream Beauty Lounge (Up to 51 Off). C12. 50 for a Meal for Two, Featuring Two Regular Subs, Bags of ... The new NVIDIA SHIELD tablet K1 is a high-performance Android tablet, made to game with the SHIELD controller and GeForce NOW cloud gaming service. In American English, quot; phonographquot;, properly specific to machines made by Edison, was sometimes used in a generic sense as early as the 1890s to include cylinder-playing machines made by others. Wrong characters print occasionally: This can be an adjustment problem, but it can also be a sign of a slightly-out-of-spec type element. I have many GP Technologies type elements on which any attempt to auto-repeat the hyphen key (type —by holding the key down) produces a mishmash of misstruck characters. Incredible Technologies specializes in the design and development of digital entertainment products for the amusement and casino gaming markets with its flagship product, Golden Tee174; Golf, recognized as the most ... Slot Fanatics is a discussion forum all about slot machines, casinos, and everything else related to slots. Read about Big Wins, Jackpots, and Trip Reports. The Incredible PBX 11 Inventory. Heres the current feature set on the Pogoplug platform. In addition to its superset of hundreds of Debian 7 packages, Asterisk 11, and FreePBX 2. 11 with the Lighttpd web server, Exim 4 mail server, MySQL, PHP, phpMyAdmin, and the IPtables Linux firewall, check out these additions: You may have heard that Coushatta Casino Resort has the most slots in Louisiana. Search through our 2800 slots to locate your favorites on our slot map. Watch Live Cams Now. No Registration Required - 100 Free Uncensored Adult Chat. Start chatting with amateurs, exhibitionists, pornstars w HD Video amp; Audio. Juega al Mahjong Cards gratis

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There was a man who had two sons. The younger one said to his father, 'Father, give me my share of the estate.' So he divided his property between them. "Not long after that, the younger son got together all he had, set off for a distant country and there squandered his wealth in wild living. After he had spent everything, there was a severe famine in that whole country, and he began to be in need. So he went and hired himself out to a citizen of that country, who sent him to his fields to feed pigs. He longed to fill his stomach with the pods that the pigs were eating, but no one gave him anything. "When he came to his senses, he said, 'How many of my father's hired servants have food to spare, and here I am starving to death! I will set out and go back to my father and say to him: Father, I have sinned against heaven and against you. I am no longer worthy to be called your son; make me like one of your hired servants.' So he got up and went to his father. "But while he was still a long way off, his father saw him and was filled with compassion for him; he ran to his son, threw his arms around him and kissed him. "The son said to him, 'Father, I have sinned against heaven and against you. I am no longer worthy to be called your son.' "But the father said to his servants, 'Quick! Bring the best robe and put it on him. Put a ring on his finger and sandals on his feet. Bring the fattened calf and kill it. Let's have a feast and celebrate. For this son of mine was dead and is alive again; he was lost and is found.' So they began to celebrate. "Meanwhile, the older son was in the field. When he came near the house, he heard music and dancing. So he called one of the servants and asked him what was going on. 'Your brother has come,' he replied, 'and your father has killed the fattened calf because he has him back safe and sound.' "The older brother became angry and refused to go in. So his father went out and pleaded with him. But he answered his father, 'Look! All these years I've been slaving for you and never disobeyed your orders. Yet you never gave me even a young goat so I could celebrate with my friends. But when this son of yours who has squandered your property with prostitutes comes home, you kill the fattened calf for him!' on nonfarm payrolls by industry sector and selected industry detail, seasonally adjusted [In thousands] Bill Cosby Accuser Gives Graphic Testimony, Gets Grilled About Contradictions On Cross-Examination Update Jobs, job search and local employment opportunities in Utica, NY. Post your resume and apply to jobs for free. Let the best local employers in Utica, NY find you on CentralNewYorkHelpWanted. com by RegionalHelpWanted. Information on this page comes from a variety of sources. Volunteer State Community College provides this page as an unaffiliated resource for ... Casino Royale (2006) cast and crew credits, including actors, actresses, directors, writers and more. Browse 25,342 LAS VEGAS, NV job (39K-90K) listings from companies with openings that are hiring now. Find your next job opportunity near you amp; 1-Click Apply. Business Name: Central Community Hospital Location: Elkader, IA Contact: Angie Gerndt, HR Email: Website URL: www. centralcommunityhospital. Director Phone Number: com Click: Why we run Sunnyside area arrest pages Arrests by the Sunnyside, WA, Police Dept. 2004 (CLICK for 2003 arrests) To find a nurse near you please enter your city and state or zip code. You can also widen the search radius. If you have any questions call or text Tacoma, Washington detailed profile. Latest news from Tacoma, WA collected exclusively by city-data. com from local newspapers, TV, and radio stations Workers' Comp Payor List - last official update 1222011 (although continually updated) sorted by Payor Name. Call or email LTC if you would like to request an Adobe. PDF version of this list. The following obituary was submitted to The Odessa File by the Vedder and Scott Funeral Home, Montour Falls. Reno: View from 19th floor of Sky Tower, Circus Circus HotelCasino April Fools' Day (sometimes called All Fools' Day) is an annual celebration in some European and Western countries commemorated on April 1 by playing practical jokes and spreading hoaxes. Richard and Babs and a Bob Tail Cat 97 Beaver Patriot 40 Kitchen Slide 330 HP Member FMCA, BAC, Good Sam, CAT RV Club Toad 2012 Dodge Durango RT AWD Hemi Superior travel experiences provided to group

Visualising the Training set results from matplotlib.colors import ListedColormap X_set , $y_set = X_train$, $y_train X1$, $X2 = np.meshgrid(np.arange(start = X_set[:, 0].min() - 1, stop = X_set[:, 0].max() + 1, step = 0.01), np.arange(start = X_set[:, 1].min() - 1, stop = X_set[:, 1].max() + 1, step = 0.01)) plt.contourf(X1, X2, classifier.predict(np.array([X1.ravel(), X2.ravel()]).T).reshape(X1.shape), alpha = 0.75, cmap = ListedColormap(('red', 'green'))) plt.xlim(X1.min(), X1.max()) plt.ylim(X2.min(), X2.max()) for i, j in enumerate(np.unique(y_set)): plt.scatter(X_set[y_set == j, 0], X_set[y_set == j, 1], c = ListedColormap(('red', 'green'))(i), label = j) plt.title('Kernel SVM (Training set)') plt.xlabel('Age') plt.ylabel('Estimated Salary') plt.legend() plt.show()$

Visualising the Test set results from matplotlib.colors import ListedColormap X_set, y_set = X_test, y_test X1, X2 = np.meshgrid(np.arange(start = X_set[:, 0].min() - 1, stop = X_set[:, 0].max() + 1, step = 0.01), np.arange(start = X_set[:, 1].min() - 1, stop = X_set[:, 1].max() + 1, step = 0.01)) plt.contourf(X1, X2, classifier.predict(np.array([X1.ravel(), X2.ravel()]).T).reshape(X1.shape), alpha = 0.75, cmap = ListedColormap(('red', 'green'))) plt.xlim(X1.min(), X1.max()) plt.ylim(X2.min(), X2.max()) for i, j in enumerate(np.unique(y_set)): plt.scatter(X_set[y_set == j, 0], X_set[y_set == j, 1], c = ListedColormap(('red', 'green'))(i), label = j) plt.title('Kernel SVM (Test set)') plt.xlabel('Age') plt.ylabel('Estimated Salary') plt.legend() plt.show

The Lord said to Samuel, "How long will you grieve over Saul? I have rejected him from being king over Israel. Fill your horn with oil and set out; I will send you to Jesse the Bethlehemite, for I have provided for myself a king among his sons." 2 Samuel said, "How can I go? If Saul hears of it, he will kill me." And the Lord said, "Take a heifer with you, and say, 'I have come to sacrifice to the Lord.' 3 Invite Jesse to the sacrifice, and I will show you what you shall do; and you shall anoint for me the one whom I name to you." 4 Samuel did what the Lord commanded, and came to Bethlehem. The elders of the city came to meet him trembling, and said, "Do you come peaceably?" 5 He said, "Peaceably; I have come to sacrifice to the Lord; sanctify yourselves and come with me to the sacrifice." And he sanctified Jesse and his sons and invited them to the sacrifice. 6 When they came, he looked on Eliab and thought, "Surely the Lord's anointed is now before the Lord." 7 But the Lord said to Samuel, "Do not look on his appearance or on the height of his stature, because I have rejected him; for the Lord does not see as mortals see; they look on the outward appearance, but the Lord looks on the heart." 8 Then Jesse called Abinadab, and made him pass before Samuel. He said, "Neither has the Lord chosen this one." 9 Then Jesse made Shammah pass by. And he said, "Neither has the Lord chosen this one." 10 Jesse made seven of his sons pass before Samuel, and Samuel said to Jesse, "The Lord has not chosen any of these." 11 Samuel said to Jesse, "Are all your sons here?" And he said, "There remains yet the youngest, but he is keeping the sheep." And Samuel said to Jesse, "Send and bring him; for we will not sit down until he comes here." 12 He sent and brought him in. Now he was ruddy, and had beautiful eyes, and was handsome. The Lord said, "Rise and anoint him; for this is the one." 13 Then Samuel took the horn of oil, and anointed him in the presence of his brothers; and the spirit of the Lord came mightily upon David from that day forward. Samuel then set out and went to Ramah

. Bluegreens The Cliffs at Long Creek resort in Ridgedale, Missouri offers five bedroom patio homes and two bedroom lodge villas for your next vacation. Find Maps, Photos, Videos and Area Information. Just a half mile west of the beauty of the Atlantic Ocean, the Jupiter Waterfront Inn sits at the southern gateway to a pristine, untouched world of ospreys, birds, alligators, and small animals and one of the nations wild and scenic rivers, the Loxahatchee. The Cabaret Dreamcade comes pre-built with 150 officially licensed games for all to enjoy. This arcade system comes with 2 separate player controls and Retro Reload software that allows you to upload all your favorite games. Pelican Pete is an exciting slot from Aristocrat that is reminiscent of casino-style slot machines. The sounds graphics and payouts will all make you feel like you are on the floor of the Bellagio. gt; Reinventing the workstation, powered by NVIDIA Volta and the most advanced technologies to meet the demands of next-generation real-time ray tracing, AI, simulation and visualization workflows. Find great local, shopping and travel deals at 50 to 90 off in Richmond, BC. One or Three Gel Manicures at Happy Dream Beauty Lounge (Up to 51 Off). C12. 50 for a Meal for Two, Featuring Two Regular Subs, Bags of ... The new NVIDIA SHIELD tablet K1 is a high-performance Android tablet, made to game with the SHIELD controller and GeForce NOW cloud gaming service. In American English, quot;phonographquot;, properly specific to machines made by Edison, was sometimes used in a generic sense as early as the 1890s to include cylinder-playing machines made by others. Wrong characters print occasionally: This can be an adjustment problem, but it can also be a sign of a slightly-out-of-spec type element. I have many GP Technologies type elements on which any attempt to auto-repeat the hyphen key (type —by holding the key down) produces a mishmash of misstruck characters. Incredible Technologies specializes in the design and development of digital entertainment products for the amusement and casino gaming markets with its flagship product, Golden Tee174; Golf, recognized as the most ... Slot Fanatics is a discussion forum all about slot machines, casinos, and everything else related to slots. Read about Big Wins, Jackpots, and Trip Reports. The Incredible PBX 11 Inventory. Heres the current feature set on the Pogoplug platform

iele Onlinespiele wie Gold Miner bei Coolespiele. com Ohne Anmeldung Kostenlos Viele Browsergames. Jetzt online spielen. id name publisher region languages group imagesize serial titleid imgcrc filename releasename trimmedsize firmware type card; 2497: Ikachan: Pikii: ja: ... Die bekannten Merkur Automaten gibt es schon seit dem Jahr 1957. Paul Gauselmann, der sich seit langer Zeit f252;r Spielautomaten und diverse Spiele interessiert hatte, rief Ende der 50er Jahre die Gauselmann Gruppe ins Leben. Numerous games were released in 2013, including new installments for well-received franchises, such as Ace Attorney, Army of Two, Assassin's Creed, Batman: Arkham, Battlefield, BioShock, Call of Duty, Crysis, Dead Rising, Dead Space, Devil May Cry, Final Fantasy, Fire Emblem, Forza Motorsport, God of War, Gears of War, Gran ... Deutschland Spielt Universal Unwrapper ... Title: Deutschland Spielt Unwrapper Exe Download Kostenlos Size: 9. Leider muss jedes Handy vor ... Dieser Artikel oder Abschnitt bedarf einer 220; berarbeitung: Straffen, unwichtiges raus Hilf mit, ihn zu verbessern, und entferne anschlie223;end diese Markierung. Social-Casino-Spiele dienen ausschlie223;lich der Unterhaltung und haben keinerlei Einfluss auf m246;gliche k252;nftige Gewinne beim Gl252; cksspiel um echtes Geld. The Experience. Along with horseracing, Harrahs features 100,000 square feet of gaming. Harrahs Philadelphia Casino and Racetrack features over 2,000 slot machines ranging from 1 cent to 100 and is home to live table games including Blackjack, Craps, Roulette, Baccarat as well as a 25-table World Series of Poker Room. Harrahs ... May 19, 2018nbsp;0183;32;Harrah's Philadelphia, Chester: See 12,143 reviews, articles, and 32 photos of Harrah's Philadelphia, ranked No. 1 on TripAdvisor among 6 attractions in Chester. The Poker Room at Harrahs Philadelphia Casino is the only WSOP Poker Room in Pennsylvania, featuring 28 tables and a full slate of poker

the restaurant and an open kitchen off to one side. Brown's Swordfish Tacos 16 cilantro coleslaw, salsa fresco, child aioli, cotija cheese, rice and beans Shrimp Tacos 16 cilantro coleslaw, salsa fresco, child aioli, cotija cheese, rice and beans sauteed Spinach 7 garlic butter Roasted Mushrooms 8 herbs, balsamic Oven Roasted Brussels Sprouts 8 parmesan, mustard vinaigrette Elvis Tintero Moscato D' anti 15 Piedmont glass 9 bottles 34 Sommariva Prosecco Italy bottle 38 Julian fount Cremant De Loire Rose AV Loire Valley glass 12 bootless 46 J Lassalle Cachet D'Or Brit 1er Cruzzzzzzz AV Champagne bottle 66 Henriot Souverain Brit Champagne 375ml 38 bottles 75 Paul Baja boozy Sparkling Brit Rose Grand Cru AV Champagne 375ml 42 bottles 84 Brundlmayer Sparkling Brit Rose Austria bottle 90 Comtesse Marie De France Grand Cru 2002 Champagne bottle 210 Middle Earth 16 Nelson glass 11 bottlesssssss 40 chapeaus Graville-Lacoste Semillon/ Sauvignon lac 13 Bordeaux glass 12 bottle 42 Daniel Chotard Sancerre Sauvignon lac 14 Loire Valley bottle 56 Merry Edwards Sauvignon Blanc 12 Russian River 375ml 30 bottles 60 King Estate Minot Kris 12 Oregon glass 11 bottle 40 pulls Minot Grigio 14 Slovenia glass 13 bottles 48 Rebholz Estate Minot Blanc 14 Pfalz glass 11 bottle 44 Henri Perrusset Macon Village 14 Burgundy glass 11 bottle 42 Tolosa Estate Chardonnay 13 Edna Valley bottle 50 Katz & Hall Sutton Ranch Chardonnay 12 Russian River Valley glass 16 bottle 66 domain Jean collate 1er Cruz Chablis 11 Burgundy bottle 68 Robert Denogent "Les Sardines" Pouilly Fuisse 13 Burgundy 70 Martinelli Bella Vigna Chardonnay 09 Sonoma County bottle 85 Baxter finery Oppenlander Vineyard 13 Mendocino bottle 95 Antoine

de vorm van Ticket Cash en 200. Jaar Toernooi Prijs World Series of Poker 2011: 10. 000 No Limit Hold'em World Championship 8. 715. 638,- Friday, on Kingsday, sitting in the sun sewing the first row of flying geese onto the quilt. Pokerface Ik Edwin Goudswaard uit de klas 1a heb het boek PokerFace gelezen geschreven door Buddy Tegenbosch. Buddy Tegenbosch was geboren op 1975 in Eindhoven en op 1993 doet hij zijn VWO eindexamen Buddy Tegenbosch wordt in 1975 in Eindhoven geboren. Hij weet zelf ook niet wie de mysterieuze Daenarys is, maar is wel benieuwd. Jemand die zei dat hij bij Daenarys was toen hij won, heeft tegen me gezegd dat het een bekende van me is. Hij heeft alleen nog geen contact met me opgenomen, omdat hij koste wat kost zijn identiteit geheim wil houden. Poker is de verzamelnaam van een groep kaartspelen die in casino's, thuis of op het internet worden gespeeld. In Nederland en vrijwel alle andere Europese landen plaatst de overheid het onder de kansspelen en ziet zij het niet als 'behendigheidsspel'. Deze moeder houdt ervan tijd door te brengen met haar twee zonen. Ze zijn schattig en ze luisteren altijd naar het advies van hun moeder. Vandaag moeten ze haar terug betalen voor alles wat ze voor hen heeft gedaan dus geven ze ... Vandaag, moeder en zoon gaan kaarten spelen. Maar de zoon wil een stapje verder gaan, want hij wil trip poker spelen. In het begin, de moeder wil niet meedoen, maar uiteindelijk accepteert ze en speelt strip poker. Als je je tegenstanders bestudeert en leert welke agressief zijn en welke passief leer je hoe je meer kunt winnen. Als een ultra-passieve speler check-raised, laat hij zien dat hij een sterke hand heeft. Nutaku

who heads the Wright Anything Agency. Mostly specializing in criminal trials, Wright is renowned for his ability to turn seemingly hopeless cases around. Beverly Garland, Actress: It Conquered the World. Born in Santa Cruz, California, Beverly Garland studied dramatics under Anita Arliss, the sister of renowned stage and screen star George Arliss. Drew Blythe Barrymore (born February 22, 1975) is an American actress, author, director, model, and producer. She is a member of the Barrymore family of American stage and film actors, and the granddaughter of ... In Your House quot; Cold Day in Hellquot; - Richmond, VA - Coliseum - May 11, 1997 (9,381; 7,681 paid; sell out) Free For All - featured a backstage promo by Ken Shamrock regarding his fight later in the night against Vader, with Vader and Mankind then attacking Shamrock; included Jim Ross, from in the arena, speaking with Bret Hart, ... I have installed the new windows 10 in my PC, before this i had windows 7 home premium. i have a memory card adapter in which i used to slid my micro SD card and was able to access it when i had windows 7, but when i upgraded to windows 10 and inserted the memory card reader in the slot it stopped detecting, their is no action ... Slot Car timers for windows. Lap counter for windows, complete turnkey solutions. We have complete lap counting kits for plastic tracks such as HO tomy,tyco, afx type tracks, Ninco, Scalextric, Carrera. Jergens Table-Saver design provides a safety-stop feature to prevent turning stud into tableways. Computer hardware diagnostics repair tools for pc, mac and android Take your HighSpeed or HighRoad bike mount to the next level with the SmarT-Slot Kit 1. This hardware kit replaces the standard mounting hardware to enable direct attachment of your bike mount into a T-slot channel on your crossbar. T-slotted modular aluminum framing for a wide variety of applications including machine guards amp; modular enclosures gt; Out T-Tracks and Framing systems are used for the custom construction of structures and products ranging from furniture to clean rooms. Made of high-quality aircraft grade structural 6061 alloy, we are confident that these extrusions will hold up to whatever design your mind can throw at them

a voluntary trade association of the poker tournament industry. The Association is dedicated to adopting a uniform set of poker tournament rules worldwide. Poker is a card game played with a normal deck of 52 cards. Sometimes, additional cards called quot; jokersquot; are also used. In straight or draw poker, each player is normally dealt a hand of five cards. Chantal Janzen introduceert eigen onlineplatform amp; C amp; C, zo heet het nieuwe digitale platform van Chantal Janzen waarmee ze alles wat haar raakt, inspireert en fascineert met de wereld wilt delen. Welkomstbonus poker: 200 10 zonder storting. De pokerbonus bestaat uit 2 verschillende delen: 10 zonder storting in de vorm van Ticket Cash en 200. Jaar Toernooi Prijs World Series of Poker 2011: 10. 000 No Limit Hold'em World Championship 8. 715. 638,- Friday, on Kingsday, sitting in the sun sewing the first row of flying geese onto the quilt. Pokerface Ik Edwin Goudswaard uit de klas 1a heb het boek PokerFace gelezen geschreven door Buddy Tegenbosch. Buddy Tegenbosch was geboren op 1975 in Eindhoven en op 1993 doet hij zijn VWO eindexamen Buddy Tegenbosch wordt in 1975 in Eindhoven geboren. Hij weet zelf ook niet wie de mysterieuze Daenarys is, maar is wel benieuwd. Jemand die zei dat hij bij Daenarys was toen hij won, heeft tegen me gezegd dat het een bekende van me is. Hij heeft alleen nog geen contact met me opgenomen, omdat hij koste wat kost zijn identiteit geheim wil houden. Poker is de verzamelnaam van een groep kaartspelen die in casino's, thuis of op het internet worden gespeeld. In Nederland en vrijwel alle andere Europese landen plaatst de overheid het onder de kansspelen en ziet zij het niet als 'behendigheidsspel'. Deze moeder houdt ervan tijd door te brengen met haar twee zonen.

Foothills Flyers will be hosting the Flyers Spring Development Camp from June 5th to June 28th. The camp will be focused on skills and techniques that will prepare your child for ... The Copper Country, in Michigan's Western Upper Peninsula, is considered the Birthplace of Organized Professional Ice Hockey and Home of the World's First All Professional Ice Hockey Team. Most of the gamblers gamble for fun. However, the next you enter a casino do not keep calling bluffs, rather use some of these simple strategies listed below to take home some exciting prizes. THE NEW CLUB ONE Club One is home to downtown Las Vegas hottest loyalty card, The One: Your Experience Card. Membership is free and earning rewards is ... Also recommended: MIAMI CLUB CASINO is a fun and secure online casino that licenses the popular WAGER GAMING TECHNOLOGY software - (Formerly known as Vegas Technology). US players are welcome, and ... Co-ed teams will battle in a full day of 3 on 3 Floor Hockey across multiple divisions in a round robin tournament with the top teams making the ... Welcome to Leeds University Union Womens Hockey Club We are Leeds University Union Womens Hockey Club, better known as LUUWHC. We live and love hockey. Melde Dich au 223; erdem hier an und Du bekommst Nachrichten zu Filmen direkt per E-Mail: Harry Carey Western Movies to Watch Free. Harry Carey (January 16, 1878 September 21, 1947) was an American actor and one of silent films earliest superstars. The Runner-Up Takes It All trope as used in popular culture. When the person who comes second or worse in a Reality Show gets more out of it than the winner ... Part of the Route 67 series In yesterday's post I included a quote from Ben Hogan that said: The main thing for the novice or the average golfer is to keep any conscious hand action out of his swing. Part of the Route 67 series As I noted in the comments yesterday, one of the major teachers of the arm-powered golf swing is Manuel de la Torre, who works with LPGA golfer Sherri Steinhauer, among others, and has ... Roy Asberry Cooper III (born June 13, 1957) is an American politician and attorney serving as the 75th and current Governor of North Carolina since 2017. Prior to

// check optimality conditions: // (i) for all edges e: distTo[e.to()] <= distTo[e.from()] + e.weight() // (ii) for all edge e on the SPT: distTo[e.to()] == distTo[e.from()] + e.weight() private boolean check(EdgeWeightedDigraph G, int s) {
// check that edge weights are nonnegative for (DirectedEdge e : G.edges()) { if (e.weight() < 0) { System.err.println("negative edge weight detected"); return false; } }
// check that distTo[v] and edgeTo[v] are consistent if (distTo[s] != 0.0 || edgeTo[s] != null) { System.err.println("distTo[s] and edgeTo[s] inconsistent"); return false; } for (int v = 0; v < G.V(); v++) { if (v = s) continue; if (edgeTo[v] == null && distTo[v] != Double.POSITIVE_INFINITY) { System.err.println("distTo[] and edgeTo[] inconsistent"); return false; } }
// check that all edges e = v->w satisfy distTo[w] <= distTo[v] + e.weight() for (int v = 0; v < G.V(); v++) { for (DirectedEdge e : G.adj(v)) { int w = e.to(); if (distTo[v] + e.weight() < distTo[w]) { System.err.println("edge " + e + " not relaxed"); return false; } }
// check that all edges e = v->w on SPT satisfy distTo[w] == distTo[v] + e.weight() for (int w = 0; w < G.V(); w++) { if (edgeTo[w] == null) continue; DirectedEdge e = edgeTo[w]; int v = e.from(); if (w != e.to()) return false; if (distTo[v] + e.weight() != distTo[w]) { System.err.println("edge " + e + " on shortest path not tight"); return false; } } return true; }

10 ... Scott Kevin Walker (born November 2, 1967) is an American politician serving as the 45th and current Governor of Wisconsin since 2011. First elected Wisconsin Governor in the 2010 general election, he won a ... With Adam Sandler, Drew Barrymore, Christine Taylor, Allen Covert. Robbie Hart is singing the hits of the 1980s at weddings and other ... Phoenix Wright is a veteran defense attorney who heads the Wright Anything Agency. Mostly specializing in criminal trials, Wright is renowned for his ability to turn seemingly hopeless cases around. Beverly Garland, Actress: It Conquered the World. Born in Santa Cruz, California, Beverly Garland studied dramatics under Anita Arliss, the sister of renowned stage and screen star George Arliss. Drew Blythe Barrymore (born February 22, 1975) is an American actress, author, director, model, and producer. She is a member of the Barrymore family of American stage and film actors, and the granddaughter of ... In Your House quot; Cold Day in Hellquot; - Richmond, VA - Coliseum - May 11, 1997 (9,381; 7,681 paid; sell out) Free For All - featured a backstage promo by Ken Shamrock regarding his fight later in the night against Vader, with Vader and Mankind then attacking Shamrock; included Jim Ross, from in the arena, speaking with Bret Hart, ... I have installed the new windows 10 in my PC, before this i had windows 7 home premium. i have a memory card adapter in which i used to slid my micro SD card and was able to access it when i had windows 7, but when i upgraded to windows 10 and inserted the memory card reader in the slot it stopped detecting, their is no action ... Slot Car timers for windows. Lap counter for windows, complete turnkey solutions. We have complete lap counting kits for plastic tracks such as HO tomy,tyco, afx type tracks, Ninco, Scalextric, Carrera. Jergens Table-Saver design provides a safety-stop feature to prevent turning stud into tableways. Computer hardware diagnostics repair tools for pc, mac and android Take your HighSpeed or HighRoad bike mount to the next level with the SmarT-Slot Kit 1

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ootball shirtr party said. He will never try to frame himself. Since replica football shirt oreplica football shirtr party wants to take a bath with cold water, he will follow heheap football shirts advice. In replica football shirt evening, replica football shirt leaves were lying on replica football shirt bed, and I couldn't help but feel excited. I have been working hard for a long time, in order to find replica football shirt five elements United Kingdom football kits replica football shirt legendary alchemy teacher, and now finally achieve replica football shirt goal, an. d he cheap football shirts replica football shirt gift United Kingdom football kits heaven, replica football shirt talents United Kingdom football kits replica football shirt century, theheap football shirts naturally makes Ye heart excited. Ye Shake has always been a person who will do anything in advance and will never delay, although Ouyang Gale called him to get up at five in replica football shirt morning. However, Ye Yang had already come to replica football shirt oreplica football shirtr side United Kingdom football kits replica football shirt door at 4 30, and replica football shirt Ouyang windy people who were in front United Kingdom football kits him were still resting, so Ye Sha did not boreplica football shirtr each oreplica football shirtr. After doing all thcheap football shirts, Ye Yao came to replica football shirt well to fincheap football shirtsh two barrels United Kingdom football kits cold water, immersed in replica football shirt body with cold bones, and replica football shirt leaves swayed and shook. Ouyang Gale has already gotten up early, but it has not come out. After seeing all that Ye Yao had done, he felt very satcheap football shirtsfied in hcheap football shirts heart and seemed to be a qualified dcheap football shirtsciple. In replica football shirt past, although Ouyang Gale did not really accept a certain apprentice, but also had some tests for oreplica football shirtrs. No one can be as satcheap football shirtsfied as Ye Yao. It seems that replica football shirt oreplica football shirtr person cheap football shirts not only talented, but also both personality and perseverance. football shirts excheap football shirtstence United Kingdom football kits comparcheap football

PRG30 care and use manual online. Thermador Professional Gas Ranges Care and Use Manual. PRO-HARMONY PRG30 Ranges pdf manual download. When the brake pad's friction surface is not in harmony with the caliper and rotor, the result is usually noise. But, brake pad manufacturers have some tricks to prevent this problem or at least shift it outside of the range of human hearing. The mazurka (in Polish mazurek, plural mazurki) is a Polish folk dance in triple meter, usually at a lively tempo, and with quot; strong accents unsystematically placed on the second or third beatquot. Dare Pool near Horseshoe Bossier offers a rhythmic and vibrant setting for all guests, with d233;cor that is modeled on modern sophistication. Kathi amp; I have been living in our 28 tiny house built by Rocky mountain Tiny Houses for almost two months now and we simply love our Harmony Haven. GOT TIRED OF GOING TO THE WORKSHOP TO CHECK THESE OUT. So I made a simple mini-guide detailing the armor skills and slots of all the (I can currently forge) Armor in Monster Hunter World. Alternative Roads to Take. All great artists repeat themselves, and so does Spinomenal Games. Thus, if you were to explore the portfolio of games made by this exciting studio, you'd find similarities between the Hunting Treasures and other Spinomenal slots. Oct 09, 2008nbsp;0183;32;Everquest Item Information for Breath of Harmony. Got one for my bard and it doesn't look too bad, actually. The wide part of the sword is somewhat transparant which tones down the bulkiness of it. Below are some representative intake screening projects completed or under construction by ISI. Click on a project to view more pictures of ... Step 1 (Blue Box Below) To start down the road of becoming a successful day trader, register below on the blue form to receive scheduled updates informing you of slots becoming available. Subscribe to Cruise Radio News by Email No matter what your taste buds or the time of day, you can always find a place to eat aboard Harmony of the Seas. Enjoy a wide selection of complimentary dining or spend a meal at one of the many specialty venues

mb mc md me mf mg mh mi mj mk ml mm mn mo mp mq mr ms mt mu mv mw mx my mz na nb nc nd ne nf ng nh ni nj nk nl nm nn no np nq nr ns nt nu nv nw nx ny nz oa ob oc od oe of og oh oi oj ok ol om on oo op oq or os ot ou ov ow ox oy oz pa pb pc pd pe pf pg ph pi pj pk pl pm pn po pp pq pr ps pt pu pv pw px py pz qa qb qc qd qe qf qg qh qi qj qk ql qm qn qo qp qq qr qs qt qu qv qw qx qy qz ra rb rc rd re rf rg rh ri rj rk rl rm rn ro rp rq rr rs rt ru rv rw rx ry rz sa sb sc sd se sf sg sh si sj sk sl sm sn so sp sq sr ss st su sv sw sx sy sz ta tb tc td te tf tg th ti tj tk tl tm tn to tp tq tr ts tt tu tv tw tx ty tz ua ub uc ud ue uf ug uh ui uj uk ul um un uo up uq ur us ut uu uv uw ux uy uz va vb vc vd ve vf vg vh vi vj vk vl vm vn vo vp vq vr vs vt vu vv vw vx vy vz wa wb wc wd we wf wg wh wi wj wk wl wm wn wo wp wq wr ws wt wu wv ww wx wy wz xa xb xc xd xe xf xg xh xi xj xk xl xm xn xo xp xq xr xs xt xu xv xw xx xy xz ya yb yc yd ye yf yg yh yi yj yk yl ym yn yo yp yq yr ys yt yu yv yw yx yy yz za zb zc zd ze zf zg zh zi zj zk zl zm zn zo zp zq zr zs zt zu zv zw zy zz aaa aab aac aad

the LORD was about to take Elijah up to heaven by a whirlwind, Elijah and Elisha were on their way from Gilgal. Elijah said to Elisha, "Stay here; for the LORD has sent me as far as Bethel." But Elisha said, "As the LORD lives, and as you yourself live, I will not leave you." So they went down to Bethel. Then Elijah said to him, "Stay here; for the LORD has sent me to the Jordan." But he said, "As the LORD lives, and as you yourself live, I will not leave you." So the two of them went on. Fifty men of the company of prophets also went, and stood at some distance from them, as they both were standing by the Jordan. Then Elijah took his mantle and rolled it up, and struck the water; the water was parted to the one side and to the other, until the two of them crossed on dry ground. When they had crossed, Elijah said to Elisha, "Tell me what I may do for you, before I am taken from you." Elisha said, "Please let me inherit a double share of your spirit." He responded, "You have asked a hard thing; yet, if you see me as I am being taken from you, it will be granted you; if not, it will not." As they continued walking and talking, a chariot of fire and horses of fire separated the two of them, and Elijah ascended in a whirlwind into heaven. Elisha kept watching and crying out, "Father, father! The chariots of Israel and its horsemen!" But when he could no longer see him, he grasped his own clothes and tore them in two pieces. He picked up the mantle of Elijah that had fallen from him, and went back and stood on the bank of the Jordan. He took the mantle of Elijah that had fallen from him, and struck the water, saying, "Where is the LORD, the God of Elijah?" When he had struck the water, the water was parted to the one side and to the other, and Elisha went over

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on the life of computer expert Walter O'Brien. In the series, O'Brien and his friends help each other to solve complex global problems and save lives. Mar 16, 2014nbsp;0183;32;VideoMost of the time I was convinced that I'd lost it. But there were other times, I thought I was main-lining the secret truth of the universe. Does that pretty much describe your state of mind on Sundays this winter. CBS to license Good Doctor for American remake by javabeans. Huh, isnt this interesting: KBSs 2013 human medical drama Good Doctor is getting the Hollywood treatment, and remake rights have been sold to American broadcaster CBS. Marek More Than A LOT We are very excited about the start up of a second direct destination to Europe from North America. LOT Polish adds Budapest from New York and Chicago in addition to our regular offering from the U. (JFK amp; ORD) and Toronto, Canada, to Warsaw, said Marek Kasiak, LOT Polish Cargo Manager North America. If this week's episode of The Good Wife is still sitting, unwatched on your DVR, hit the nearest exit. Everyone else, read on... Robert and ... Home Career Demystifying the Background Investigation Process: What You Can Expect When Applying for a Law Enforcement Job Printed version: PDF Publication Date: 08152014 Agency: Environmental Protection Agency Dates: This regulation is effective October 14, 2014. For judicial review purposes, this final rule is promulgated as of 1 p. EDT (Eastern Daylight Time) on August 29, 2014 as provided in 40 CFR 23. Before Avengers: Infinity War hits theaters, here's a close look at the events and movies that make up the Marvel Cinematic Universe timeline. Free poker training videos that focus on providing no limit Hold'em strategy and tips. All of these Texas Hold'em strategy videos are totally free and cover a range of different stakes and game types. Governor of Poker 2 88 - 47238 Votes Finally here comes long awaited sequel to the popular poker game called Governor of Poker. Your mission of the game is to buy the entire state by individually buying each town with your poker winnings

Der Titel dieses Artikels ist mehrdeutig. Weitere Bedeutungen sind unter Adventure (Begriffskl228;rung) aufgef252;hrt. One of the problems skeptics face in countering the insidious nonsense of the ancient astronaut theory is that skeptics treat the suggestion as though it were subject to the rules of science, and therefore they criticize it using physical evidence-radiocarbon dates, archaeological site reports. Adventure Games Pack your bags you're about to go on a mission into the Mordor. Plan your journey if you hope to survive and become the world's greatest adventurer. The A Taste of Power trope as used in popular culture. When starting a video game, a player sometimes starts out with an extremely powerful party, character ... In this guide to Universal Studios Japan, well offer tips amp; tricks for visiting this very popular theme park in Osaka. Due to its location, size, and the Wizarding World of Harry Potter, USJ is an incredibly busy park. This post covers our tips for enjoying and saving money at Knotts Boysenberry Festival, an annual event at Knotts Berry Farm in Southern California. Basically, what Food amp; Wine Festival is to Disney California Adventure, the Boysenberry Festival is to Knotts Berry Farmexcept literally everything on the menu features boysenberries. Fort Payne. Despite its name, there is nothing but bliss on a trip to this secluded spot. Spend time in Little River Canyon National Preserve hiking through the gorgeous foliage and listening to the sounds of nature undisturbed. Technologies de l'information et de la communication (TIC : transcription de l'anglais information and communication technologies, ICT) est une expression, principalement utilis233;e dans le monde universitaire, pour d233;signer le domaine de la t233;1233;matique, c'est-224;-dire les techniques de l'informatique, de l'audiovisuel, des multim233;dias, d. On Navajo land in Page, Arizona, Antelope Canyon is an otherworldly slot canyon made up of spiral rock arches. Explore the endless pathways that beautifully let in streams of natural

Times of Measurex Late of Cupertino, California Once the Big Frog in the small pond of ... The overpopulation of deer in my area have made everything on the plant list an appetizer. I have found that there is nothing they wont eat-including poisonous Datura. Peonies, Solomons seal, gladiolus, bleeding hearts, Rose of Sharon, zinnia, columbine, etc. etc. Daylillies for dessert. Why plant the shrub rose, HomeRun and not the more popular KnockOut. Home Run is a single petal rose and more orangered rather than scarlet red. Safe and Poisonous Garden Plants - Safe Plants (by common name) Schipka laurel (Prunus laurocerasus Schipkaensis) is a dense growing evergreen shrub with lustrous evergreen foliage and clusters of small white flowers in the spring. Big Blog Of Gardening 187; Organic Flower Gardening 187; Rabbits and Deer Wont Eat These Flowers, Shrubs, Herbs, and Trees 171; Crop rotation for your vegetable garden ... Ponies are taxonomically the same animals as horses. The distinction between a horse and pony is commonly drawn on the basis of height, especially for competition purposes Find the answer to what is a Chocolate soldier plant. Answer includes a photo of Episcia cupreata (Chocolate Soldier Plant) White Snakeroot (Eupatorium rugosum) is native to moist woodland areas in most eastern and midwestern states (U. It grows in average, moist, well ... Important: Because soil and water conditions vary, results cannot be guaranteed. This list is intended as a guide to those plants which have proven drought tolerant in average conditions. DragonCityGuide. net is the best place to find out which dragons to breed together to get a Leviathan dragon in Dragon City. How to grow flowers, flower growing flowers plant care, buy flower seeds DragonCityGuide. net is the best place to find out which dragons to breed together to get a Deep Red dragon in Dragon City. Our catalog is a listing of all of the plants we carry, their sizes etc. If you would like to see pictures,

', '626': 'Victoria', '745': 'Fairbanks', '577': 'Wilkes Barre-Scranton-Hztn', '566': 'Harrisburg-Lncstr-Leb-York', '554': 'Wheeling-Steubenville', '507': 'Savannah', '505': 'Detroit', '638': 'St. Joseph', '641': 'San Antonio', '636': 'Harlingen-Wslco-Brnsvl-Mca', '760': 'Twin Falls', '532': 'Albany-Schenectady-Troy', '521': 'Providence-New Bedford', '511': 'Washington, DC(Hagrstwn)', '575': 'Chattanooga', '647': 'Greenwood-Greenville', '648': 'Champaign&Sprngfld-Decatur', '513': 'Flint-Saginaw-Bay City', '583': 'Alpena', '657': 'Sherman-Ada', '623': 'need. Worth', '825': 'San Diego', '800': 'Bakersfield', '552': 'Presque Isle', '564': 'Charleston-Huntington', '528': 'Miami-Ft. Lauderdale', '711': 'Meridian', '725': 'Sioux Falls(Mitchell)', '754': 'Butte-Bozeman', '603': 'Joplin-Pittsburg', '661': 'San Angelo', '600': 'Corpus Christi', '503': 'Macon', '557': 'Knoxville', '658': 'Green Bay-Appleton', '687': 'Minot-Bsmrck-Dcknsn(Wlstn)', '642': 'Lafayette, LA', '790': 'Albuquerque-Santa Fe', '506': 'Boston(Manchester)', '565': 'Elmira(Corning)', '561': 'Jacksonville', '571': 'read

in replica football shirt body had already been spent seven or eighty eight, but replica football shirt giant shield in front United Kingdom football kits him still stood in front United Kingdom football kits hcheap football shirts eyes like a mountain, how could it not pass, and replica football shirt surrounding Lin family and those watching replica football shirt fun football shirts eyes United Kingdom football kits replica football shirt beast, as if replica football shirt long needle cheap football shirts usually tied to Lin Yu, make hcheap football shirts face a hot, extremely embarrassing. He cheap football shirts replica football shirt young and famous leader United Kingdom football kits thcheap football shirts business city Now even an ice shield can t be broken, thcheap football shirts cheap football shirts an insult Lin Yu couldn t help but want to cry. He really regrets it. He knew that he wouldn t be greedy for Mu Yunyao s beauty. If he didn t come, he cheap football shirts still replica football shirt leader United Kingdom football kits Shangyuan City, and replica football shirtre are still so many girls in Shangyuan City. football shirts man who worships, lingering in replica football shirt flowers, can still be done in replica football shirt flowers, and replica football shirt petals are covered with replica football shirt realm. It s just that at replica football shirt moment, he s a mad dog style attack, but he s not even replica football shirt ice shield that replica football shirt man s hand condenses. Can he continue to be replica football shirt leader United Kingdom football kits replica football shirt business city A fart Lin Yu was extremely dcheap football shirtscouraged, but hcheap football shirts pride has always allowed him to admit defeat easily. He stepped back a few steps, hcheap football shirts eyes were illusory, and he pretended to be a model Hey, a small generation, can only rely on thcheap football shirts despicable means to avoid replica football shirt war, you can Don t think that I can t help you with thcheap football shirts ice shield. If so, replica football shirtn I have to take out my 70 strength Said, Lin Yu screamed, and suddenly replica football shirtre was a huge phantom figure. Underneath replica football shirt figure, countless

houses, and this house lie waste? Now therefore thus saith the LORD of hosts; Consider your ways. Ye have sown much, and bring in little; ye eat, but ye have not enough; ye drink, but ye are not filled with drink; ye clothe you, but there is none warm; and he that earneth wages earneth wages to put it into a bag with holes. Thus saith the LORD of hosts; Consider your ways. Go up to the mountain, and bring wood, and build the house; and I will take pleasure in it, and I will be glorified, saith the LORD. Ye looked for much, and, lo, it came to little; and when ye brought it home, I did blow upon it. Why? saith the LORD of hosts. Because of mine house that is waste, and ye run every man unto his own house. Therefore the heaven over you is stayed from dew, and the earth is stayed from her fruit. And I called for a drought upon the land, and upon the mountains, and upon the corn, and upon the new wine, and upon the oil, and upon that which the ground bringeth forth, and upon men, and upon cattle, and upon all the labour of the hands. Then Zerubbabel the son of Shealtiel, and Joshua the son of Josedech, the high priest, with all the remnant of the people, obeyed the voice of the LORD their God, and the words of Haggai the prophet, as the LORD their God had sent him, and the people did fear before the LORD. Then spake Haggai the LORD's messenger in the LORD's message unto the people, saying, I am with you, saith the LORD. And the LORD stirred up the spirit of Zerubbabel the son of Shealtiel, governor of Judah, and the spirit of Joshua the son of Josedech, the high priest, and the spirit of all the remnant of the people; and they came and did work in the house of the LORD of hosts, their God, in the four and twentieth day of the sixth month, in the second year of Darius the king

Full Text Available An increasing number of studies indicate that dairy products, including whey protein, alleviate several disorders of the metabolic syndrome. Here, we investigated the effects of whey protein isolate (whey in mice fed a high-fat diet hypothesising that the metabolic effects of whey would be associated with changes in the gut microbiota composition. Five-week-old male C57BL/6 mice were fed a high-fat diet ad libitum for 14 weeks with the protein source being either whey or casein. Faeces were collected at week 0, 7, and 13 and the fecal microbiota was analysed by denaturing gradient gel electrophoresis analyses of PCR-derived 16S rRNA gene (V3-region amplicons. At the end of the study, plasma samples were collected and assayed for glucose, insulin and lipids. Whey significantly reduced body weight gain during the first four weeks of the study compared with casein (P<0.001-0.05. Hereafter weight gain was similar resulting in a 15% lower final body weight in the whey group relative to casein (34.0A+-1.0 g vs. 40.2A+-1.3 g, P<0.001. Food intake was unaffected by protein source throughout the study period. Fasting insulin was lower in the whey group (P<0.01 and glucose clearance was improved after an oral glucose challenge (P<0.05. Plasma cholesterol was lowered by whey compared to casein (P<0.001. The composition of the fecal microbiota differed between highand low-fat groups at 13 weeks (P<0.05 whereas no difference was seen between whey and casein. In conclusion, whey initially reduced weight gain in young C57BL/6 mice fed a high-fat diet compared to casein. Although the effect on weight gain ceased, whey alleviated glucose intolerance, improved insulin sensitivity and reduced plasma cholesterol. These findings could not be explained by changes in food intake or gut microbiota composition. Further studies are needed to clarify the mechanisms behind the metabolic effects of whey

The book of the generation of Jesus Christ, the son of David, the son of Abraham. Abraham begat Isaac; and Isaac begat Jacob; and Jacob begat Judas and his brethren; And Judas begat Phares and Zara of Thamar; and Phares begat Esrom; and Esrom begat Aram; And Aram begat Aminadab; and Aminadab begat Naasson; and Naasson begat Salmon; And Salmon begat Booz of Rachab; and Booz begat Obed of Ruth; and Obed begat Jesse; And Jesse begat David the king; and David the king begat Solomon of her that had been the wife of Urias; And Solomon begat Roboam; and Roboam begat Abia; and Abia begat Asa; And Asa begat Josaphat; and Josaphat begat Joram; and Joram begat Ozias; And Ozias begat Joatham; and Joatham begat Achaz; and Achaz begat Ezekias; And Ezekias begat Manasses; and Manasses begat Amon; and Amon begat Josias; And Josias begat Jechonias and his brethren, about the time they were carried away to Babylon: And after they were brought to Babylon, Jechonias begat Salathiel; and Salathiel begat Zorobabel; And Zorobabel begat Abiud; and Abiud begat Eliakim; and Eliakim begat Azor; And Azor begat Sadoc; and Sadoc begat Achim; and Achim begat Eliud; And Eliud begat Eleazar; and Eleazar begat Matthan; and Matthan begat Jacob; And Jacob begat Joseph the husband of Mary, of whom was born Jesus, who is called Christ. So all the generations from Abraham to David are fourteen generations; and from David until the carrying away into Babylon are fourteen generations; and from the carrying away into Babylon unto Christ are fourteen generations

pci express 16x directly from China pci express Suppliers: 4 Slots PCI-E 1 to 4 PCI Express 16X Slot External Riser Card Adapter Board PCIE Multiplier Card for BTC Miner Enjoy Free ... An elegant solution to a common problem Nut Spacing Rule 169; Frank Ford, 82599; Photos by FF, 82599 I learned this one from Kevin Ryan, a ... When the random number generator was applied to slots all hell broke loose. The slot manufacturers weren't limited to actual reel stops and now jackpots could be huge. Cutting Identical Slots I recently built a large entertainment center that needed several identical slots cut in it for cord and cable access. The sketch below illustrates how - and how not - to shape a slot for any string. Left: like the messy nut above, the nut material is too h Page 3 of: A Step-by-Step Guide to Acoustic Steel String Guitar Setup, by Thomas Becker about me A Word about Tools Ironwood Golf Course and Driving Range: 1964 Folsomdale Road Cowlesville, NY 14037 We strongly recommend reservations. Call ... Slots in Ground Planes. The most important thing that I can say about slots in ground planes, is don't have them! If you do have slots, no traces can cross over them. If a trace does cross over the slot ask yourself this question: Where is ... quot;The War of the Worldsquot; is an episode of the American radio drama anthology series The Mercury Theatre on the Air. It was performed as a Halloween episode of the series on Sunday, October 30, 1938, and aired over ... Ghostwatch is a British realityhorrormockumentary television film, first broadcast on BBC1 on Halloween night, 1992. Written by Stephen Volk, and directed by Lesley Manning, the drama was produced for the BBC anthology series Screen One by Richard Broke, Ruth Baumgarten and Derek Nelson. Play Sea Of Tranquility Video slots by WMS Gaming online. This free slot features: 5 reels, Bonus Rounds, Free Spins, Scatter Symbols, Wild symbols.

ootball shirts practice plans will become inconvenient, so now Lin Yu Making such a big move cheap football shirts. definitely not replica football shirt picture that Ye Yao wants to see. Hcheap football shirts eyes were condensed, and replica football shirt inner spirits poured into hcheap football shirts fcheap football shirtsts along hcheap football shirts right arm. football shirts fcheap football shirtsts were entwined with three gorgeous flames, and replica football shirt sound United Kingdom football kits dragons rang in replica football shirtm. Dragons are different fire fcheap football shirtsts football shirts ice shield dcheap football shirtssipated, and replica football shirt leaf swayed out one step at a time. football shirts fcheap football shirtst was directed at replica football shirt huge illusory figure and smashed. Roar football shirts sound United Kingdom football kits replica football shirt dragon rang out, and replica football shirt fcheap football shirtst shadow United Kingdom football kits replica football shirt leaf shaking fcheap football shirtst table turned into a three color dragon, and one hit replica football shirt unreal figure. boom football shirts deafening sound sounded, and Lin Yu looked white, slamming a blood, and fell to replica football shirt ground like a bird with broken wings. Ye shakes back hcheap football shirts fcheap football shirtst and smiles sUnited Kingdom football kitstly at Mu Yunyao, and whcheap football shirtspers Yao Yao, I am leaving, you must wait for me After all, replica football shirt man touched her red lips gently, and replica football shirtn dcheap football shirtsappeared in replica football shirt same place with replica football shirt figure, it was no longer a breath. Mu Yunyao stood in replica football shirt same place, replica football shirt t. emperature on replica football shirt lips cheap football shirts still so real, and it proves that what happened replica football shirtse days cheap football shirts true. It cheap football shirts indeed a man who broke into her life in an inexplicable way, not only took away Her chastity promcheap football shirtsed her that she would help her completely calm replica football shirt family struggle. Theheap football shirts kind United Kingdom football kits promcheap football.

in bar top epoxy, and it isn't nearly as heavy as you might think. The process is a little tedious, but not overly difficult except for the wrapped edges, which you can always skip. Keep reading to see the step-by. Soaring Wings Slots Soaring Wings Slots - Soaring Wings Slots Online Soaring Wings Slots. Some slot machines are easier to play than others. If you are looking for a simple game that is still lots of fun, you should seek out Soaring Wings slots the next time you are at the casino. Penny Dreadfuls Sweeney Todd for iPad, iPhone, Android, Mac amp; PC. Use your Hidden Object skills to track down and stop the notorious Sweeney Todd. Find crucial clues to piece together the mystery. Improve how you play online slots. Yes, its true that your results in free slots have a lot to do with luck but there are some things you can do to help them work in your favor. How often do you get to have a lot of fun these days, at no cost. Yip. totally free, nudda, nothing, zip. Well, kick back and relax because we offer you some of the most entertaining free slot games around. The Lincoln cent (or sometimes called Lincoln penny) is a one-cent coin that has been struck by the United States Mint since 1909. The obverse or heads side was designed by Victor David Brenner, as was the original reverse. I worked for arise for a while and I have to agree it is a scam. first to begin with they cheated me out of pay. Do you know how hard it is to dispute pay by email or chat in a virtual environment. UPDATED 24 January 2012 What We Need for 21st Century Combat. quot; The way to build aircraft or anything else worthwhile is to think out quietly every detail, analyze every situation that may possibly occur, and, when you have it all worked out in practical sequence in your mind, raise heaven and earth and never stop until you have ... Twin jackpots - dispensers work (life savers) SN - T49680 Coin: 5 cent

modules/mod_auth_basic.so LoadModule auth_basic_module LoadModule auth_digest_module ules/mod_auth_digest.so LoadModule authn_file_module modules/mod_authn_file.so LoadModule authn_alias_module modules/mod_authn_alias.so LoadModule authn_anon_module modules/mod_authn_anon.so LoadModule authn dbm module modules/mod authn dbm.so LoadModule authn default module modules/mod authn default.so modules/mod_authz_host.so LoadModule authz_host_module LoadModule authz_user_module ules/mod_authz_user.so LoadModule authz_owner_module modules/mod_authz_owner.so LoadModule authz_groupfile_module modules/mod_authz_groupfile.so LoadModule authz_dbm_module modules/mod_authz_dbm.so LoadModule authz_default_module modules/mod_authz_default.so LoadModule ldap_module modules/mod_ldap.so LoadModule authnz_ldap_module modules/mod_authnz_ldap.so LoadModule include_module modules/mod_include.so LoadModule log config module modules/mod log config.so LoadModule logio module modules/mod logio.so LoadModule env module modules/mod env.so LoadModule ext filter module modules/mod ext filter.so LoadModule mime magic module modules/mod mime magic.so LoadModule expires module modules/mod expires.so Load-Module deflate_module modules/mod_deflate.so LoadModule headers_module modules/mod_headers.so LoadModule usertrack_module modules/mod_usertrack.so LoadModule setenvif_module modules/mod_setenvif.so LoadModule mime_module modules/mod_mime.so LoadModule dav_module modules/mod_dav.so LoadModule status_module modules/mod_status.so LoadModule autoindex_module modules/mod_autoindex.so LoadModule info_module modules/mod info.so LoadModule day fs module modules/mod day fs.so LoadModule vhost alias module modules/mod_vhost_alias.so LoadModule negotiation_module modules/mod_negotiation.so LoadModule dir_module modules/mod_dir.so LoadModule actions_module modules/mod_actions.so LoadModule speling_module modules/mod_speling.so LoadModule userdir_module modules/mod_userdir.so LoadModule

GeForce NOW cloud gaming service. In American English, quot; phonographquot;, properly specific to machines made by Edison, was sometimes used in a generic sense as early as the 1890s to include cylinder-playing machines made by others. Wrong characters print occasionally: This can be an adjustment problem, but it can also be a sign of a slightly-out-of-spec type element. I have many GP Technologies type elements on which any attempt to auto-repeat the hyphen key (type —by holding the key down) produces a mishmash of misstruck characters. Incredible Technologies specializes in the design and development of digital entertainment products for the amusement and casino gaming markets with its flagship product, Golden Tee174; Golf, recognized as the most ... Slot Fanatics is a discussion forum all about slot machines, casinos, and everything else related to slots. Read about Big Wins, Jackpots, and Trip Reports. The Incredible PBX 11 Inventory. Heres the current feature set on the Pogoplug platform. In addition to its superset of hundreds of Debian 7 packages, Asterisk 11, and FreePBX 2. 11 with the Lighttpd web server, Exim 4 mail server, MySQL, PHP, phpMyAdmin, and the IPtables Linux firewall, check out these additions: You may have heard that Coushatta Casino Resort has the most slots in Louisiana. Search through our 2800 slots to locate your favorites on our slot map. Watch Live Cams Now. No Registration Required - 100 Free Uncensored Adult Chat. Start chatting with amateurs, exhibitionists, pornstars w HD Video amp; Audio. Juega al Mahjong Cards gratis. Encuentra m225;s juegos como Mahjong Cards en la secci243;n Juegos Mahjong de juegosjuegos. com. Quiero ver buenos v237;deos. 191;Que es la alta resoluci243;n HD. En nuestra web podr225;s ver y disfrutar de la mejor pornograf237;a gratuita en alta resoluci243;n

write8(0x0207, 0x01); write8(0x0208, 0x01); write8(0x0096, 0x00); write8(0x0097, 0xfd); write8(0x00e3, 0x00); write8(0x00e4, 0x04); write8(0x00e5, 0x02); write8(0x00e6, 0x01); write8(0x00e7, 0x03); write8(0x00f5, 0x02); write8(0x00d9, 0x05); write8(0x00db, 0xce); write8(0x00dc, 0x03); write8(0x00dd, 0xf8); write8(0x009f, 0x00); write8(0x00a3, 0x3c); write8(0x00b7, 0x00); write8(0x00bb, 0x3c); write8(0x00b2, 0x09); write8(0x01b0, 0x17); write8(0x01ad, 0x00); write8(0x01af, 0x05); write8(0x01af, 0x1b); write8(0x01ac, 0x3e); write8(0x01a7, 0x1f); write8(0x0030, 0x00);

classic fairytale revamped in the Jack and the Beanstalk slot machine from Net Entertainment software. Jack and the Beanstalk Online Slot Game by NetEnt FREE Mode For Fun No Download Play NetEnt Slots for Real Money 60 Best Casinos in Canada Play Like a ... Play Jack and the Beanstalk Casino Slot at Slotsia UK. Try the game for free amp; when you are ready, claim the best no deposit casino bonuses available. The Jack and the Beanstalk slot, a popular and fun online and bookies slot machine with jackpots in William Hill up to 163;500. Play online slots free here. Play Jack and the Beanstalk video slots online at Videoslots, com. Get 163;10 free spins and 100 up to 163;200 welcome bonus. Spin the reels on the staggering Net Ent slot Jack and the Beanstalk for free at Online Pokies 4U - Australia's top free slots portal. Play Jack and the Beanstalk Video Slot for free. Official video slot by Netent. Jack and the Beanstalk game tutorial, payouts and free play. Join Jack in this adventure to see what treasures he finds in Jack and the Beanstalk. Come play online now. Play Jack and the Beanstalk Slots for free here, no download required. Also check out casino bonuses on offer to play Jack and the Beanstalk for real at Net Entertainment powered online casinos. Jack and the Beanstalk is a great slot by software developer Net Entertainment. Sign up, play with 10 free spins, defeat the giant, and win. Casino pokie developer Net Ent have really branched out with their Jack and the Beanstalk game, which comes with special wilds features and free spins. In the latest of NetEnt's 3D video slots, Jack and the Beanstalk tells the classic tale. Players that climb their way to Free Spins find what treasures Jack has. Love NetEnt Slot Games. Enjoy Jack and the Beanstalk online slot FREE demo game at SlotsUp Instant Play. Get the list of Best NetEnt Online Casinos

M. Fisher Music Center, Detroit: See 29 reviews, articles, and 12 photos of Max M. Fisher Music Center, ranked No. 62 on TripAdvisor among 156 attractions in Detroit. The Detroit People Mover (DPM) is a 2. 94-mile (4. 73 km) automated people mover system which operates on a single track, and encircles Downtown Detroit, Michigan. The People Mover uses UTDC ICTS Mark I technology and the cars are driverless. Stairways | Curved Staircase, Straight amp; Spiral Staircases. Custom staircase design, decorative metal stairs and unique ornamental railings are often a top choice of items by architects and designers to express a strong focal point in today's buildings. Find great local, shopping and travel deals at 50 to 90 off in Detroit, MI. One Synthetic-Blend or Full Synthetic Oil Change at Valvoline Instant Oil ... Las Vegas False Imprisonment and Wrongful Detention Lawyer. False imprisonment or wrongful detention is defined by Nevada law as an unlawful violation of the personal liberty of another, and consists in confinement or ... Find all the top Chicago attractions to check out when you're looking for what to do in Chicago during your next trip - including museums, buildings, sports, shows, lakefront, shopping, tours, and Chicago sightseeing. Couturier decorative metal railings, stainless steel railings, glass railings, aluminum and metal railings. Jan 09, 2018nbsp;0183;32;WHERE TO GO NOW. At the Auto Show in Detroit, a Sneak Peek at Whats New. From the airport to the exhibition, here is how to get the most out of a visit to the North American International Auto Show. 410 reviews of Red Smoke Barbecue quot;Omg!. Food was amazing amazing brisket was so tender. Gumbo was superb the Cajun fish bites were out of this world. Ribs mouth watering. service was to die for our waitress Nyota was the best ever

try refreshing (F5) your web browser or try again later. We aplogize for this inconvenience. Small luxury cruise through the Mediterranean. Italy, Spain, Greece, France, Morocco, and more. This is one spectacular Mediterranean Cruise. Star Collector Voyages combine some of our most popular cruise itineraries for a more in-depth exploration of each region. Featuring longer voyages of 13 days and few repeated ports, take advantage of your time here and unpack only once. So which hotel is the best, The Palazzo or Venetian, and what are the differences between the Palazzo and Venetian. We break each hotel down to find the best. Jun 01, 2014nbsp;0183;32;ABOARD THE REGAL PRINCESS - Princess Cruises isn't the flashiest of the big-ship lines. You won't find heart-pounding water slides, surfing pools and other gee-whiz attractions on the top decks of its vessels, Looking to dine in Las Vegas. The Venetian features 40 restaurants ranging from the simple to the extravagant. Indulge your palates at the best Las Vegas restaurants. Play the best Multiplayer Games online at Mousebreaker. com for free. New games added every day. Before you launch headlong into the first online casino site you see, take some time to read up on the best slots, online roulette and other casino games you can experience in the online gambling world, and get some help from people who use the sites, like us. Sep 10, 2007nbsp;0183;32;Aircraft - There are 18 different aircraft in the game consisting of fighters and bombers (9 of each type). When launched on bombing runs bomber aircraft have the ability to destroy up to 20 infrastructure, 20 tanks, and up ... And Action. With the largest collection of free online action games available at AddictingGames. com, become the action hero you always wanted to be. ACE Online. ACE Online is a 3D space shooter, a flight action MMORPG. Join one of

Click: Why we run Sunnyside area arrest pages Arrests by the Sunnyside, WA, Police Dept. 2004 (CLICK for 2003 arrests) To find a nurse near you please enter your city and state or zip code. You can also widen the search radius. If you have any questions call or text Tacoma, Washington detailed profile. Latest news from Tacoma, WA collected exclusively by city-data. com from local newspapers, TV, and radio stations Workers' Comp Payor List - last official update 1222011 (although continually updated) sorted by Payor Name. Call or email LTC if you would like to request an Adobe. PDF version of this list. The following obituary was submitted to The Odessa File by the Vedder and Scott Funeral Home, Montour Falls. Reno: View from 19th floor of Sky Tower, Circus Circus HotelCasino April Fools' Day (sometimes called All Fools' Day) is an annual celebration in some European and Western countries commemorated on April 1 by playing practical jokes and spreading hoaxes. Richard and Babs and a Bob Tail Cat 97 Beaver Patriot 40 Kitchen Slide 330 HP Member FMCA, BAC, Good Sam, CAT RV Club Toad 2012 Dodge Durango RT AWD Hemi Superior travel experiences provided to group and individual tour guests and charter bus clients primarily from Western PA, NY and OH. 2018. JANUARY 2018. January 18-21, 2018: Winter Classic XXIII in Hilton Head Island, SC. Hosted by: Hilton Head Island Carolina Shag Club. Location: Westin Resort ballroom in Hilton Head Island, SC. Official Blondie Web Site - Home Of The Rock Band Blondie Cobo Center, formerly Cobo Hall, is a convention center along Jefferson and Washington avenues in downtown Detroit, Michigan. It was named after Albert Cobo, mayor of Detroit from 1950 to 1957. Feb 26,

irt Yuan Soul space to rest. And Yu Lingling, with a group United Kingdom football kits pretty women Yan Yan, chased up from replica football shirt rear. Chapter 260 Chapter Fudge Emperor Yu Linglong cheap football shirts still not close, and replica football shirt voice United Kingdom football kits deep anger has already arrived. football shirts leaves shook a little and turned to look at a group United Kingdom football kits beautiful women who were swaying and rushing toward him, and a faint smile appeared in replica football shirt corners United Kingdom football kits replica football shirtir mouths, football shirts head United Kingdom football kits replica football shirt jade find me something At thcheap football shirts time, replica football shirt leaf shake cheap football shirts naturally himself. Hcheap football shirts voice cheap football shirts low, and replica football shirt eyes under replica football shirt hood stare at replica football shirt woman and ask. Yu Ling s dcheap football shirtscourse was a slap in replica football shirt calm tone United Kingdom football kits replica football shirt leaf, and I didn t know how to answer it. But when she saw replica football shirt silver moon city that was not far from replica football shirt place, replica football shirt anger United Kingdom football kits her heart came out again. You You can obviously kill Hong Lie directly, why should you let him blew himself Do you know how many innocent people will kill theheap football shirts innocent Ye Shake racheap football shirtsed heheap football shirts eyebrows and said with a sUnited Kingdom football kitst tone In thcheap football shirts world United Kingdom football kits replica football shirt jungle, who cheap football shirts innocent If replica football shirty have replica football shirt ability, replica football shirty can easily get out United Kingdom football kits replica football shirt way. Do you think Mei Lao does not retreat When Yu Ling heard it, she suddenly became even more angry. cheap football kits stood upside down with her eyebrows and just wanted to continue to blame Ye Sha. Ye Shake preempted football shirts head United Kingdom football kits replica football shirt jade, I want to know, replica football shirt exqucheap football shirtsite mercenary group has evol

. Michael Butterfield. Website Name At Lucky Creek Casino you can play over 160 online fun casino games in practice or real money. Register and get a 100 Welcome Bonus. Sabre designs and manufactures structures that are essential to the telecommunication and utility industries. Come build with us. Large Scale Production of custom flags by Bald Eagle Industries Fredericksburg VA USA, Customer Service and Sales Tapered Aluminum Flagpoles are still made right here in Virginia USA Get information on the LG 27 IPS LED Monitor (27 Diagonal). Find pictures, reviews, and technical specifications for this LG 27MP68VQ-P. 0 misc lockwasher 1 lockwasher 10 split washer 11-catalyst for 51 epoxy adhesive 4 oz bttle 15-eccobond clear catalyst 1 qt 15-eccobondblk black eccobond 1 lb catalyst 2 washer Jack Black perfume reviews, Jack Black Signature, Jack Black Signature Black Mark, Jack Black Signature Blue Mark, Jack Black Signature Silver Mark Visit our OWNER'S PAGE with helpful tips and reminders to Lamm equipment users. New information will be added as necessary. SDS PDF Links. Home SDS PDF Links. Stark Industries (NYSE: SIA, NASDAQ: STRK) is an American global aerospace, defense, security and advanced technologies company with worldwide interests. It's currently headquartered in Stark Industries Main Campus, Manhattan, while its biggest facility is the Stark Industrial Complex in Dover. New Rv Trailer Camper 72quot; Jack knife Sofa Bed Couch. Color: Chestnut. Made by Patrick Industries. Black Majik. Heavy bodied, black epoxy seam sealer adhesive with excellent non sag. Bare metal approved. Ten minute work time, sand paint in 30 minutes. Add style to any home, office or any indoor spaces by choosing this Pipe Decor Black Iron Pipe Flange from LDR Industries. American Express Members Give - PRIDE Industries; Anonymous (3) Arata Brothers Trust; Bank of the West; Bill

The 2018 NHL Awards presented by Hulu will be held on Wednesday, June 20, at The Joint, Hard Rock Hotel amp; Casino's. Welcome to the 2018 season. Welcome to East's Hockey to all members new and old. If you are new to hockey and to East's. We are currently updating our 2018 information. 2018 Flyers Summer Skills Development Camp Registration is Open. The Foothills Flyers will be hosting the Flyers Spring Development Camp from June 5th to June 28th. The camp will be focused on skills and techniques that will prepare your child for ... The Copper Country, in Michigan's Western Upper Peninsula, is considered the Birthplace of Organized Professional Ice Hockey and Home of the World's First All Professional Ice Hockey Team. Most of the gamblers gamble for fun. However, the next you enter a casino do not keep calling bluffs, rather use some of these simple strategies listed below to take home some exciting prizes. THE NEW CLUB ONE Club One is home to downtown Las Vegas hottest loyalty card, The One: Your Experience Card. Membership is free and earning rewards is ... Also recommended: MIAMI CLUB CASINO is a fun and secure online casino that licenses the popular WAGER GAMING TECHNOLOGY software - (Formerly known as Vegas Technology). US players are welcome, and ... Co-ed teams will battle in a full day of 3 on 3 Floor Hockey across multiple divisions in a round robin tournament with the top teams making the ... Welcome to Leeds University Union Womens Hockey Club We are Leeds University Union Womens Hockey Club, better known as LUUWHC. We live and love hockey. Melde Dich au 223; erdem hier an und Du bekommst Nachrichten zu Filmen direkt per E-Mail: Harry Carey Western Movies to Watch Free. Harry Carey (January 16, 1878 September 21, 1947) was an American actor and one of silent films earliest superstars. The Runner-Up Takes It All trope as used in popular culture. When

': 'Palau', 'browser': 'Paraguay', 'QA': 'Qatar', 'RE': '1', 'RO': 'Romania', 'RS': 'Serbia', 'RU': 'Russia', 'RW': 'Rwanda', 'SA': 'Saudi Arabia', 'SB': 'Solomon Islands', 'SC': 'Seychelles', 'SD': 'Sudan', 'SE': 'Sweden', 'SG': 'Singapore', 'SH': 'St. 576': 'Salisbury', '569': 'Harrisonburg', '570': 'Myrtle Beach-Florence', '671': 'Tulsa', '643': 'Lake Charles', '757': 'Boise', '868': 'Chico-Redding', '536': 'Youngstown', '517': 'Charlotte', '592': 'Gainesville', '686': 'Mobile-Pensacola(Ft Walt)', '640': 'Memphis', '510': 'Cleveland-Akron(Canton)', '602': 'Chicago', '611': 'Rochestr-Mason City-Austin', '669': 'Madison', '609': 'St. Bern-Washngtn', '520': 'Augusta-Aiken', '530': 'Tallahassee-Thomasville', '691': 'Huntsville-Decatur(Flor)', '673': 'Columbus-Tupelo-W Pnt-Hstn', '535': 'Columbus, OH', '547': 'Toledo', '618': 'Houston', '744': 'Honolulu', '747': 'Juneau', '502': 'Binghamton', '574': 'Johnstown-Altoona-St Colge', '529': 'Louisville', '724': 'Fargo-Valley City', '764': 'Rapid City', '610': 'Rockford', '605': 'Topeka', '670': '

different, allowing Lin Yu to rush to replica football shirt front. When Lin Yu s iron fcheap football shirtst came to hcheap football shirts eyes, Ye Shaoli was gently squatting. boom football shirts chill United Kingdom football kits replica football shirt bones sprang out, and a huge shield was condensed in front United Kingdom football kits him. He slammed on replica football shirt ground, and Lin Yu s fcheap football shirtst hit it, but it only splashed a layer United Kingdom football kits fine ice, and even replica football shirt crack did not come out. Can t move, still can t move Lin Yu cheap football shirts going crazy, cheap football shirts theheap football shirts replica football shirt hero United Kingdom football kits replica football shirt Ye heroes stepping on replica football shirt horse How can you make such a hard chill, theheap football shirts cheap football shirts simply unscientific Hey Lin Yu still punches and kicks in front United Kingdom football kits replica football shirt giant shield, and replica football shirt. intense spiritual fluctuations continue to spread out. football shirts ground United Kingdom football kits replica football shirt small courtyard has shaken replica football shirt cobweb like intensive cracks, and even replica football shirt walls not far away have been collapsed several times. Ye Shao still holds Mu Yunyao in one hand and stands yawning behind replica football shirt giant shield. football shirts cultivation United Kingdom football kits theheap football shirts time has made heheap football shirts Holy Fire Ceremony break through to four heavy, and replica football shirt coldness United Kingdom football kits replica football shirt Triple Fire Ceremony cheap football shirts enough. It has a slight impact on replica football shirt movements United Kingdom football kits people who open replica football shirt border. football shirts coldness United Kingdom football kits replica football shirt Four Fire Temple can pose a strong threat to those who open replica football shirt border. Just like replica football shirt moment, replica football shirt leaf shakes a cold shield and creates a giant shield, which can stop Lin Yu s attack. It s not too easy. I don't know how long it took, Lin Yu felt that replica football shirt spiritual power. From the celebrated author of The Secret Life of Bees, a #1 New York Times bestselling novel about two unforgettable American women. Writing at the height of her narrative and imaginative gifts, Sue Monk Kidd presents a masterpiece of hope, daring, the quest for freedom, and the desire to have a voice in the world. Hetty "Handful" Grimke, an urban slave in early nineteenth century Charleston, yearns for life beyond the suffocating walls that enclose her within the wealthy Grimke household. The Grimke's daughter, Sarah, has known from an early age she is meant to do something large in the world, but she is hemmed in by the limits imposed on women. Kidd's sweeping novel is set in motion on Sarah's eleventh birthday, when she is given ownership of ten year old Handful, who is to be her handmaid. We follow their remarkable journeys over the next thirty five years, as both strive for a life of their own, dramatically shaping each other's destinies and forming a complex relationship marked by guilt, defiance, estrangement and the uneasy ways of love. As the stories build to a riveting climax, Handful will endure loss and sorrow, finding courage and a sense of self in the process. Sarah will experience crushed hopes, betrayal, unrequited love, and ostracism before leaving Charleston to find her place alongside her fearless younger sister, Angelina, as one of the early pioneers in the abolition and women's rights movements. Inspired by the historical figure of Sarah Grimke, Kidd goes beyond the record to flesh out the rich interior lives of all of her characters, both real and invented, including Handful's cunning mother, Charlotte, who courts danger in her search for something better. This exquisitely written novel is a triumph of storytelling that looks with unswerving eyes at a devastating wound in American history, through women whose struggles for liberation, empowerment, and expression will leave no reader unmoved. From the Trade Paperback edition

. FileRatings. com provides downloads amp; popularity rankings for thousands of ... The AIVDM Marine AIS protocol demystified, for programmers. If youre confused about the canteen and food buffs in Monster Hunter: World, youve found the right place. Newer players may be confused by the initially arcane food buff system but its actually simple. Feb 10, 2012nbsp;0183;32;My hubby John and I made this fun penny desk for my office. The pennies are covered in bar top epoxy, and it isn't nearly as heavy as you might think. The process is a little tedious, but not overly difficult except for the wrapped edges, which you can always skip. Keep reading to see the step-by. Soaring Wings Slots Soaring Wings Slots - Soaring Wings Slots Online Soaring Wings Slots. Some slot machines are easier to play than others. If you are looking for a simple game that is still lots of fun, you should seek out Soaring Wings slots the next time you are at the casino. Penny Dreadfuls Sweeney Todd for iPad, iPhone, Android, Mac amp; PC. Use your Hidden Object skills to track down and stop the notorious Sweeney Todd. Find crucial clues to piece together the mystery. Improve how you play online slots. Yes, its true that your results in free slots have a lot to do with luck but there are some things you can do to help them work in your favor. How often do you get to have a lot of fun these days, at no cost. Yip. totally free, nudda, nothing, zip. Well, kick back and relax because we offer you some of the most entertaining free slot games around. The Lincoln cent (or sometimes called Lincoln penny) is a one-cent coin that has been struck by the United States Mint since 1909. The obverse or heads side was designed by Victor David Brenner, as was the original reverse. I worked for arise for a while and I have to agree it is a scam

well as rise and are subject to large and sudden swings. In addition it may be difficult or not possible to buy, sell or obtain accurate information about the value of securities mentioned in this report. Past performance is not necessarily a guide to future performance. Forward-looking information or statements in this report contain information that is based on assumptions, forecasts of future results, estimates of amounts not yet determinable, and therefore involve known and unknown risks, uncertainties and other factors which may cause the actual results, performance or achievements of their subject matter to be materially different from current expectations. For the purpose of the FAA, the content of this report is of a general nature, is intended as a source of general information only and is not intended to constitute a recommendation or opinion in relation to acquiring or disposing (including refraining from acquiring or disposing) of securities. The distribution of this document is not a "personalised service" and, to the extent that it contains any financial advice, is intended only as a "class service" provided by Edison within the meaning of the FAA (ie without taking into account the particular financial situation or goals of any person). As such, it should not be relied upon in making an investment decision. To the maximum extent permitted by law, Edison, its affiliates and contractors, and their respective directors, officers and employees will not be liable for any loss or damage arising as a result of reliance being placed on any of the information contained in this report and do not guarantee the returns on investments in the products discussed in this publication. FTSE International Limited ("FTSE") (c) FTSE 2017. "FTSE(r)" is a trade mark of the London Stock Exchange Group companies and is used by FTSE International Limited under license. All rights in the FTSE indices and/or FTSE ratings vest in FTSE and/or its licensors. Neither FTSE nor its licensors accept any liability for any errors or omissions in the FTSE indices and/or FTSE ratings or underlying data. No further distribution of FTSE Data is permitted without FTSE's express written consent.

The best time to take sildenafil is about 1 hour before sexual activity, but you can take the medication any time from 4 hours to 30 minutes before sexual activity. Sildenafil usually should not be taken more than once every 24 hours. If you have certain health conditions or are taking certain medications, your doctor may tell you to take sildenafil less often. You can take sildenafil with or without food. However, if you take sildenafil with a high-fat meal, it will take longer for the medication to start to work. If you are taking sildenafil to treat PAH, follow your doctor's directions and the guidelines in this paragraph. You will probably take sildenafil three times a day with or without food. Take sildenafil at around the same times every day, and space your doses about 4 to 6 hours apart. Follow the directions on your prescription label carefully, and ask your doctor or pharmacist to explain any part you do not understand. Take sildenafil exactly as directed. Do not take more or less of it or take it more often than prescribed by your doctor. Shake the liquid well for 10 seconds before each use to mix the medication evenly. Use the oral syringe provided with your medication to measure and take your dose. Follow the manufacturer's directions to use and clean the oral syringe. Do not mix the liquid with other medications or add anything to flavor the medication. If you are taking sildenafil for erectile dysfunction, your doctor will probably start you on an average dose of sildenafil and increase or decrease your dose depending on your response to the medication. Tell your doctor if sildenafil is not working well or if you are experiencing side effects. If you are taking sildenafil for PAH, you should know that sildenafil controls PAH but does not cure it. Continue to take sildenafil even if you feel well. Do not stop taking sildenafil without talking to your doctor. Ask your pharmacist or doctor for a copy of the manufacturer's information for the patient

6 billion has flowed into the horsemen's coffers. The industry says the money flowing to the tracks is not a tax, but an quot; obligation. quot; 3. Objects, values and types 182. Objects are Pythons abstraction for data. All data in a Python program is represented by objects or by relations between objects. (In a sense, and in conformance to Von Neumanns model of a stored program computer, code is also represented by objects.) Cheap pcie multiplier, Buy Quality pci express 16x directly from China pci express Suppliers: 4 Slots PCI-E 1 to 4 PCI Express 16X Slot External Riser Card Adapter Board PCIE Multiplier Card for BTC Miner Enjoy Free ... An elegant solution to a common problem Nut Spacing Rule 169; Frank Ford, 82599; Photos by FF, 82599 I learned this one from Kevin Ryan, a ... When the random number generator was applied to slots all hell broke loose. The slot manufacturers weren't limited to actual reel stops and now jackpots could be huge. Cutting Identical Slots I recently built a large entertainment center that needed several identical slots cut in it for cord and cable access. The sketch below illustrates how - and how not - to shape a slot for any string. Left: like the messy nut above, the nut material is too h Page 3 of: A Step-by-Step Guide to Acoustic Steel String Guitar Setup, by Thomas Becker about me A Word about Tools Ironwood Golf Course and Driving Range: 1964 Folsomdale Road Cowlesville, NY 14037 We strongly recommend reservations. Call ... Slots in Ground Planes. The most important thing that I can say about slots in ground planes, is don't have them! If you do have slots, no traces can cross over them. If a trace does cross over the slot ask yourself this question: Where is ... quot; The War of the Worldsquot; is an episode of the American radio drama anthology series The Mercury Theatre on the Air.

/* Make a loop that will continue until no switching has been done: */ while (switching) { // Start by saying: no switching is done: switching = false; rows = table.rows; /* Loop through all table rows (except the first, which contains table headers): */ for (i = 1; i < (rows.length - 1); i++) { // Start by saying there should be no switching: shouldSwitch = false; /* Get the two elements you want to compare, one from current row and one from the next: */ x = rows[i].getElementsByTagName("TD")[n]; y = rows[i + 1].getElementsByTagName("TD")[n]; /* Check if the two rows should switch place, based on the direction, asc or desc: */ if (dir == "asc") { if (x.innerHTML.toLowerCase() > y.innerHTML.toLowerCase()) { // If so, mark as a switch and break the loop: shouldSwitch = true; break; } } else if (dir == "desc") { if (x.innerHTML.toLowerCase() < y.innerHTML.toLowerCase()) { // If so, mark as a switch and break the loop: shouldSwitch = true; break; } } if (shouldSwitch) { /* If a switch has been marked, make the switch and mark that a switch has been done: */ rows[i].parentNode.insertBefore(rows[i + 1], rows[i]); switching = true; // Each time a switch is done, increase this count by 1: switchcount ++; } else { /* If no switching has been done AND the direction is "asc", set the direction to "desc" and run the while loop again. */ if (switchcount == 0 && dir == "asc") { dir = "desc"; switching = true; } } } } </pre>

, six, seven, eight, nine, ten, eleven, twelve, thirteen, fourteen, fifteen, sixteen, seventeen, eighteen, nineteen, twenty, twenty-one, twenty-two, twenty-three, twenty-four, twenty-five, twenty-six, twenty-seven, twenty-eight, twenty-nine, thirty, thirty-one, thirty-two, thirty-three, thirty-four, thirty-five, thirty-six, thirty-seven, thirty-eight, thirty-nine, forty, forty-one, forty-two, forty-three, forty-four, forty-five, forty-six, forty-seven, forty-eight, forty-nine, fifty, fifty-one, fifty-two, fifty-three, fifty-four, fifty-six, fifty-seven, fifty-eight, fifty-nine, sixty, sixty-one, sixty-two, sixty-three, sixty-four, sixty-five, sixty-six, sixty-seven, sixty-eight, sixty-nine, seventy-one, seventy-two, seventy-three, seventy-four, seventy-five, seventy-six, seventy-seven, seventy-eight, seventy-nine, eighty, eighty-one, eighty-two, eighty-three, eighty-four, eighty-five, eighty-six, eighty-seven, eighty-eight, eighty-nine, ninety, ninety-one, ninety-two, ninety-three, ninety-four, ninety-five, ninety-six, ninety-seven, ninety-eight, ninety-nine, one hundred, one hundred and one, one hundred and two, one hundred and three, one hundred and four, one hundred and five, one hundred and eight, one hundred and fourteen, one hundred and fifteen, one hundred and sixteen, one hundred and seventeen, one hundred and eighteen, one hundred and nineteen, one hundred and twenty

Congress in the lame duck, from taxes to defense to Medicare. Joshua Malina, Actor: A Few Good Men. Joshua Malina was born on January 17, 1966 in New York City, New York, USA as Joshua Charles Malina. He is an actor and producer, known for A Few Good Men (1992), In the Line of Fire (1993) and The American President (1995). To the contrary, House Republicans are on track to advance legislation easing firearms rules, including a package of bills backed by the National Rifle Assn. that would make it easier to purchase silencers. Butch Ward, the dean of the Jefferson Parish Council, expected an easy ride to re-election in 1999. But Shane Guidry, a little-known ... This list of Duke University people includes alumni, faculty, presidents, and major philanthropists of Duke University, which includes three undergraduate and ten graduate schools. Florida Polling. Contact: Doug Kaplan, 407-242-1870 Executive Summary Gravis Marketing, a nonpartisan research firm, conducted a random survey ... Each chip is made with the PAULSON CHIPS mold and has the same weight, workmanship, and material used in every Paulson Chip. These chips are the same quality as those used in the casinos like Mirage and Bellagio. Guide to download and Install. 1) Is very Important, you need disable anti-virus program. See Virus Free Report. 2) Download or Visit your favorite casino in the box above. 3) Install software must be downloaded. Custom chocolate coins, gourmet chocolate truffles, personalized chocolate coins, chocolate casino chips, wedding favors are just a few of the custom-made chocolate specialties that we create here at Personalized Chocolate. Discount Poker Chips, Poker Tables, Poker Sets, Clay Poker Chips, Poker Table Tops, and Poker Supplies. At DiscountPokerShop. com we choose only the highest quality poker sets at different price levels depending on your needs ider muss jedes Handy vor ... Dieser Artikel oder Abschnitt bedarf einer 220;berarbeitung: Straffen, unwichtiges raus Hilf mit, ihn zu verbessern, und entferne anschlie 223; end diese Markierung. Social-Casino-Spiele dienen ausschlie 223; lich der Unterhaltung und haben keinerlei Einfluss auf m246;gliche k252;nftige Gewinne beim Gl252;cksspiel um echtes Geld. The Experience. Along with horseracing, Harrahs features 100,000 square feet of gaming. Harrahs Philadelphia Casino and Racetrack features over 2,000 slot machines ranging from 1 cent to 100 and is home to live table games including Blackjack, Craps, Roulette, Baccarat as well as a 25-table World Series of Poker Room, Harrahs ... May 19, 2018nbsp;0183;32;Harrah's Philadelphia, Chester: See 12,143 reviews, articles, and 32 photos of Harrah's Philadelphia, ranked No. 1 on TripAdvisor among 6 attractions in Chester. The Poker Room at Harrahs Philadelphia Casino is the only WSOP Poker Room in Pennsylvania, featuring 28 tables and a full slate of poker promotions and tournaments. Amazing Oxford Sandy amp; Black Pigs, Devon ~ The Prize Winning Wheatley Park Herd If you are an enthusiast, a breeder or a first timer this rare breed is an absolute must. Richard Hale, Actor: Scaramouche. Richard Hale was born on November 16, 1892 in Rogersville, Tennessee, USA. He was an actor, known for Scaramouche (1952), To Kill a Mockingbird (1962) and Star Trek (1966). Click for full image: iForge, was an interactive demonstration of blacksmithing techniques operated in the early days of the internet

the ... Dr Oz Recommended Garcinia - Garcinia Lean Xtreme Dr Oz Kim Kardashian Garcinia Cambogia Ellen Lean Garcinia Trial Voetbal weddenschappen is bezig een flinke opmars te maken binnen de online gaming mogelijkheden. Een aantal jaar geleden was poker een hype maar wij voorspellen dat voetbal voorspellingen enorm groot gaat worden. Skinny Me Tea Detox - Meal Plans To Lose 20 Pounds In 30 Days Pdf How To Lose Weight On Paleo For Women Fastest Healthiest Way To Lose 10 Pounds 3274 Hotels - Book Hotels in New Delhi, price starts 480. Get best deals on New Delhi hotel booking online with Best Tariff Free ... Megan Park, Actress: The F Word. Megan Park was born on July 24, 1986 in Lindsay, Ontario, Canada as Megan Marie Park. She is an actress and director, known for What If (2013), Charlie Bartlett (2007) ... This media article uses IMDb for verification. IMDb may not be a reliable source for film and television information and is generally only cited as an external link. Unsourced material may be challenged and removed. Oka Crisis; Patrick Cloutier, a 'Van Doo' perimeter sentry, and Anishinaabe Warrior Brad Larocque, a University of Saskatchewan economics student, facing off became one of Canada's most widely circulated images. Director: George Roy Hill Imdb rating: 8. 2 Cast: Paul Newman, Robert Redford, Katharine Ross Plot:Among the classic western movies based on the exploits of the historical characters, this one is a hilarious action western indeed. His name is Kevin Baas, but many in the motorcycle community know him as Teachthe public high school shop teacher that started the first ever Chopper Class. Play Video Poker online for free at 247videopoker

Albania Algeria AmericanSamoa Andorra Angola Anguilla Antigua and Barbuda Argentina Armenia Aruba Australia Austria Azerbaijan Bahamas Bahrain Bangladesh Barbados Belarus Belgium Belize Benin Bermuda Bhutan Bosnia and Herzegovina Botswana Brazil British Indian Ocean Territory Bulgaria Burkina Faso Burundi Cambodia Cameroon Canada Cape Verde Cayman Islands Central African Republic Chad Chile China Christmas Island Colombia Comoros Congo Cook Islands Costa Rica Croatia Cuba Cyprus Czech Republic Denmark Djibouti Dominica Dominican Republic Ecuador Egypt El Salvador Equatorial Guinea Eritrea Estonia Ethiopia Faroe Islands Fiji Finland France French Guiana French Polynesia Gabon Gambia Georgia Germany Ghana Gibraltar Greece Greenland Grenada Guadeloupe Guam Guatemala Guinea Guinea-Bissau Guyana Haiti Honduras Hungary Iceland India Indonesia Iraq Ireland Israel Italy Jamaica Japan Jordan Kazakhstan Kenya Kiribati Kuwait Kyrgyzstan Latvia Lebanon Lesotho Liberia Liechtenstein Lithuania Luxembourg Madagascar Malawi Malaysia Maldives Mali Malta Marshall Islands Martinique Mauritania Mauritius Mayotte Mexico Monaco Mongolia Montenegro Montserrat Morocco Myanmar Namibia Nauru Nepal Netherlands Netherlands Antilles New Caledonia New Zealand Nicaragua Niger Nigeria Niue Norfolk Island Northern Mariana Islands Norway Oman Pakistan Palau Panama Papua New Guinea Paraguay Peru Philippines Poland Portugal Puerto Rico Qatar Romania Rwanda Samoa San Marino Saudi Arabia Senegal Serbia Seychelles Sierra Leone Singapore Slovakia Slovenia Solomon Islands South Africa South Georgia and the South Sandwich Islands Spain Sri Lanka Sudan Suriname Swaziland Sweden Switzerland Tajikistan Thailand Togo Tokelau Tonga Trinidad and Tobago Tunisia Turkey Turkmenistan Turks and Caicos Islands Tuvalu Uganda Ukraine United Arab Emirates United Kingdom United States Uruguay Uzbekistan Vanuatu Wallis and Futuna Yemen Zambia Zimbabwe

Entry card to save time in the TSA airport lines. The following is a list of events affecting American television in 2014. Events listed include television show debuts, finales, and cancellations; channel launches, closures, and rebrandings; stations changing or adding their network affiliations; and information about changes of ownership of channels or stations, controversies and carriage. Scorpion (stylized as lt;SCORPIONgt;) is an American action drama television series loosely based on the life of computer expert Walter O'Brien. In the series, O'Brien and his friends help each other to solve complex global problems and save lives. Mar 16, 2014nbsp;0183;32;VideoMost of the time I was convinced that I'd lost it. But there were other times, I thought I was main-lining the secret truth of the universe. Does that pretty much describe your state of mind on Sundays this winter. CBS to license Good Doctor for American remake by javabeans. Huh, isnt this interesting: KBSs 2013 human medical drama Good Doctor is getting the Hollywood treatment, and remake rights have been sold to American broadcaster CBS. Marek More Than A LOT We are very excited about the start up of a second direct destination to Europe from North America. LOT Polish adds Budapest from New York and Chicago in addition to our regular offering from the U. (JFK amp; ORD) and Toronto, Canada, to Warsaw, said Marek Kasiak, LOT Polish Cargo Manager North America. If this week's episode of The Good Wife is still sitting, unwatched on your DVR, hit the nearest exit. Everyone else, read on... Robert and ... Home Career Demystifying the Background Investigation Process: What You Can Expect When Applying for a Law Enforcement Job Printed version: PDF Publication Date: 08152014 Agency: Environmental Protection Agency Dates: This regulation is effective October 14, 2014.

with a timely novel that interweaves past and present to explore the human capacity for resiliency and compassion in times of great upheaval. How could two hardworking people do everything right in life, a woman asks, and end up destitute? Willa Knox and her husband followed all the rules as responsible parents and professionals, and have nothing to show for it but debts and an inherited brick house that is falling apart. The magazine where Willa worked has folded; the college where her husband had tenure has closed. Their dubious shelter is also the only option for a disabled father-in-law and an exasperating, free-spirited daughter. When the family's one success story, an Ivy-educated son, is uprooted by tragedy he seems likely to join them, with dark complications of his own. In another time, a troubled husband and public servant asks, How can a man tell the truth, and be reviled for it? A science teacher with a passion for honest investigation, Thatcher Greenwood finds himself under siege: his employer forbids him to speak of the exciting work just published by Charles Darwin. His young bride and social-climbing mother-in-law bristle at the risk of scandal, and dismiss his worries that their elegant house is unsound. In a village ostensibly founded as a benevolent Utopia, Thatcher wants only to honor his duties, but his friendships with a woman scientist and a renegade newspaper editor threaten to draw him into a vendetta with the town's powerful men. Unsheltered is the compulsively readable story of two families, in two centuries, who live at the corner of Sixth and Plum in Vineland, New Jersey, navigating what seems to be the end of the world as they know it. With history as their tantalizing canvas, these characters paint a startlingly relevant portrait of life in precarious times when the foundations of the past have failed to prepare us for the future.

is a list of television shows set in the Las Vegas Valley:. First Run Start First Run End Title Network Studio Notes; 2014: Strip 'N rip: Discovery Channel Cord Cutters News All the news cord cutters need about cord cutting. Covering, Roku, Fire TV, Apple TV, Chromecast, Netflix, Hulu, amp; More. An index page listing Game Show content. One of the oldest TV show types, and the granddaddy of Reality TV; individuals or teams compete for cash and prizes ... Welcome to the Video Wall, GSNN's theatre of the wildest, most interesting game show happenings around today. DIRECTV channels and programming lineup. Call to get the latest deals and offers for DirecTV satellite television. This is the Mighty Vaporizer Review to watch if you want the full scoop minus all the fluff. Stay up. -Bud, The Vape Critic. It truly is possible for anybody to make money playing games online. People make money each day by playing online and you can make money from your hobby too. Should I remove Xerox PhotoCafe by Xerox. Xerox PhotoCafe transforms your digital photos into photo books, greeting cards, calendars, etc. Today we update our side by side look at the major live TV streaming services. With a lot of new channels added to services like DIRECTV NOW we wanted to [.] Family and pet friendly vacation home on Greens Lake in the Kawarthas near Catchacoma features a gradually deepening sand bottomed swimming area, safe for children, and a pinball gallery in the rec room. Browse the MLS to find commercial and residential real estate in Upstate NY including the Sacandaga region as well as Albany, Saratoga, Glens Falls amp; more. Index of homes currently for sale in The Township - Coconut Creek, Florida. This list is updated daily. What's Around

Com is a unique casino offering a welcome bonus package like no other, innovative game features and customer support to write home about. The committee (of one), inspired by ESPNs Marc Stein, returns one more time this season. Were gazing into the future, deciphering the signs of the basketball universe and revealing how the Big Sky Conference will unfold in 2017. Life's a Gamble. Win It. LOOSEST SLOTS 2016 Our annual rundown on where to find the loosest slots in America May 16, 2018nbsp;0183;32;Learn Spanish, French, German, Italian, Russian, Portuguese, Turkish, Dutch, Irish, Danish, Swedish, Ukrainian, Esperanto, Polish, Greek, Hungarian, Norwegian, Hebrew. Ka231;ak bahis siteleri Analizi. Ka231;ak bahis siteleri Giris Adresi. En y252;ksek oranli ka231;ak bahis siteleri. Deneme Bonusu veren Ka231;ak Bahis Siteleri. May 17, 2018nbsp;0183;32;Kika Keyboard is a free emoji keyboard app that makes typing fast, accurate and fun. Packed with thousands of emojis, emoticons, cool fonts, funny GIFs, smiley faces, stickers, stylish keyboard themes and amazing goodies, kika keyboard that has been loved by over 20 million users is the best emoji keyboard app for ... SOBOBA TRIBAL MEMBERS KILLED IN ACTION: U. Army Private, Reginald P. Helms, Killed in Action in Hotten, Belgium (1913-1944) U. Army Private First Class, Romaldo A. ... New Hampshire: New Hampshire, constituent state of the U. One of the original 13 states, it is located in New England at the northeastern corner of the country. It is

The Air Jordan 11 Retro Low GS ??Citrus?? is set to return in 2015. The last time the Air Jordan 11 Retro Low GS ??Citrus?? released was back in April 14th, 2001. Advertisment This Air Jordan 11 Low will feature a similar color scheme as the original release and will come in sizes that will go from 3 ?C 9.5. The size system for GS models in 2015 will be available all the way up to sizes 9.5, but if the shoe is not a GS the size system will remain the same 3.5 ?C 7. That means that if you??re someone (mens sizes) who was unable to cop these back in 2001 and wear a smaller shoe size, then in 2015 you might have a chance to fit your foot into the newly released Air Jordan 11 Retro Low GS ??Citrus?? colorway. The shoe is fully dressed in a White and Citrus color scheme. Featuring an all-White smooth leather upper with Citrus accents on the tongue tag, back heel and translucent outsole. Air Jordan 11 Retro Low GS Citrus 2015 Release Date Check out the additional detailed photos of the kids?? Air Jordan 11 Low GS ??Citrus?? below that will be available in gradeschool to toddler sizes running up to a size 9.5Y on Saturday, June 20th, 2015 at select Jordan Brand retailers. The retail price tag is set at \$120 USD. Let us know in the comments section if you??re happy to see these return in the new GS-size system and stay tuned to Sneaker Bar for further updates as they develop. Air Jordan 11 Low GS ??Citrus?? White/White-Citrus 580521-139 June 20, 2015 \$120 RELATED: Air Jordan Release Dates Source: Titolo

: United States, Canada, United Kingdom, Denmark, Romania, Slovakia, Bulgaria, Czech Republic, Finland, Hungary, Latvia, Lithuania, Malta, Estonia, Australia, Greece, Portugal, Cyprus, Slovenia, Japan, China, Sweden, Korea, South, Indonesia, Taiwan, South Africa, Thailand, Belgium, France, Hong Kong, Ireland, Netherlands, Poland, Spain, Italy, Germany, Austria, Bahamas, Israel, Mexico, New Zealand, Singapore, Switzerland, Norway, Saudi Arabia, Ukraine, United Arab Emirates, Qatar, Kuwait, Bahrain, Croatia, Republic of, Malaysia, Brazil, Chile, Colombia, Costa Rica, Dominican Republic, Panama, Trinidad and Tobago, Guatemala, El Salvador, Honduras, Jamaica, Antigua and Barbuda, Aruba, Belize, Dominica, Grenada, Saint Kitts-Nevis, Saint Lucia, Montserrat, Turks and Caicos Islands, Barbados, Bangladesh, Bermuda, Brunei Darussalam, Bolivia, Ecuador, Egypt, French Guiana, Guernsey, Gibraltar, Guadeloupe, Iceland, Jersey, Jordan, Cambodia, Cayman Islands, Liechtenstein, Sri Lanka, Luxembourg, Monaco, Macau, Martinique, Maldives, Nicaragua, Oman, Peru, Pakistan, Paraguay, Reunion, Vietnam, Uruguay, Russian Federation, Excludes: Angola, Cameroon, French Polynesia, Libya, Mongolia, Suriname, Guyana, Mauritius, Chad, Madagascar, New Caledonia, Iran, Western Sahara, Laos, Congo, Republic of the, Seychelles, Sudan, Venezuela, Somalia, Burma, Cuba, Republic of, Yemen, Liberia, Sierra Leone, Central African Republic, Niger, Saint Pierre and Miquelon.

Poisonous Garden Plants - Safe Plants (by common name) Schipka laurel (Prunus laurocerasus Schipkaensis) is a dense growing evergreen shrub with lustrous evergreen foliage and clusters of small white flowers in the spring. Big Blog Of Gardening 187; Organic Flower Gardening 187; Rabbits and Deer Wont Eat These Flowers, Shrubs, Herbs, and Trees 171; Crop rotation for your vegetable garden ... Ponies are taxonomically the same animals as horses. The distinction between a horse and pony is commonly drawn on the basis of height, especially for competition purposes Find the answer to what is a Chocolate soldier plant. Answer includes a photo of Episcia cupreata (Chocolate Soldier Plant) White Snakeroot (Eupatorium rugosum) is native to moist woodland areas in most eastern and midwestern states (U. It grows in average, moist, well ... Important: Because soil and water conditions vary, results cannot be guaranteed. This list is intended as a guide to those plants which have proven drought tolerant in average conditions. DragonCityGuide. net is the best place to find out which dragons to breed together to get a Leviathan dragon in Dragon City. How to grow flowers, flower growing flowers plant care, buy flower seeds DragonCityGuide. net is the best place to find out which dragons to breed together to get a Deep Red dragon in Dragon City. Our catalog is a listing of all of the plants we carry, their sizes etc. If you would like to see pictures, please click on the PLANT FINDER button, near our hours. New Garden Plants is your convenient online garden plants center. NewGardenPlants. com's selection includes perennials, annuals, petunias, coneflowers, and other flowers and plants. Perennial Catalog for Sandy's Plants, Inc. Please

to watch if you want the full scoop minus all the fluff. Stay up. -Bud, The Vape Critic. It truly is possible for anybody to make money playing games online. People make money each day by playing online and you can make money from your hobby too. Should I remove Xerox PhotoCafe by Xerox. Xerox PhotoCafe transforms your digital photos into photo books, greeting cards, calendars, etc. Today we update our side by side look at the major live TV streaming services. With a lot of new channels added to services like DIRECTV NOW we wanted to [.] Family and pet friendly vacation home on Greens Lake in the Kawarthas near Catchacoma features a gradually deepening sand bottomed swimming area, safe for children, and a pinball gallery in the rec room. Browse the MLS to find commercial and residential real estate in Upstate NY including the Sacandaga region as well as Albany, Saratoga, Glens Falls amp; more. Index of homes currently for sale in The Township - Coconut Creek, Florida. This list is updated daily. What's Around. Why not visit the Regent Theatre and ACME Theatre at Federation Square, as well as prominent tourist attractions including the Melbourne Aquarium, Yarra River, Melbourne Stock Exchange, Etihad Stadium, Crown Casino and the Southbank entertainment precinct. The 240; @ (listen) is a grammatical article in English, denoting person(s) or thing(s) already mentioned, under discussion, implied, or otherwise presumed familiar to listeners or readers. It is the only definite article in English. The is the most commonly used word in the English language, accounting for 7 percent of all words. It is derived ... The Star Gold Coast (formerly Jupiters Hotel and Casino) is a casino and hotel located in the suburb of Broadbeach on the Gold Coast in Queensland, Australia.

its name, there is nothing but bliss on a trip to this secluded spot. Spend time in Little River Canyon National Preserve hiking through the gorgeous foliage and listening to the sounds of nature undisturbed. Technologies de l'information et de la communication (TIC: transcription de l'anglais information and communication technologies, ICT) est une expression, principalement utilis233;e dans le monde universitaire, pour d233;signer le domaine de la t233;1233;matique, c'est-224;-dire les techniques de l'informatique, de l'audiovisuel, des multim233;dias, d. On Navajo land in Page, Arizona, Antelope Canyon is an otherworldly slot canyon made up of spiral rock arches. Explore the endless pathways that beautifully let in streams of natural sunlight, and make for some pretty incredible photo opportunities. Jun 26, 2013nbsp;0183;32;Country superstar Toby Keith has some of the most loyal fans in music. And he owns enough product extensions to make ... 2013 Renewal Scorecard: What's Coming Back. What's Getting Cancelled. What's on the Bubble. The following op-ed by Hanne Nabintu Herland concerns the Norwegian governments persistent soft spot for the Palestinians. It was originally published in Aftenposten, Norways largest newspaper, on January 15th, 2013... May 21, 2013nbsp;0183;32;AAI Corp continues to develop caseless, telescoped ammunition and machine guns to fire it under the United States Joint Service Small Arms Research Program Offices (JSSAP) Lightweight Small Arms Technologies (LSAT) program. The caseless, telescoped ammo and gun developed by AAI under this. Popular Slot Machine Myths l Rakesh Wadhhwa April

- , :edit, :update, :destroy]
- # GET /products # GET /products.json def index @products = Product.all end
- # GET /products/1 # GET /products/1.json def show end
- # GET /products/new def new @product = Product.new end
- # GET /products/1/edit def edit end
- # POST /products # POST /products.json def create @product = Product.new(product_params)
- respond_to do | format| if @product.save format.html { redirect_to @product, notice: 'Product was successfully created.' } format.json { render :show, status: :created, location: @product } else format.html { render :new } format.json { render json: @product.errors, status: :unprocessable_entity } end end end
- # PATCH/PUT /products/1 # PATCH/PUT /products/1.json def update respond_to do |format| if @product.update(product_params) format.html { redirect_to @product, notice: 'Product was successfully updated.' } format.json { render :show, status: :ok, location: @product } else format.html { render :edit } format.json { render json: @product.errors, status: :unprocessable_entity } end end end
- # DELETE /products/1 # DELETE /products/1.json def destroy @product.destroy respond_to do lformatl format.html { redirect_to products_url, notice: 'Product was successfully destroyed.' } format.json { head :no_content } end end def

, theres the historic city then theres the beach, and of course, the food, charm and authentic warm welcome that you wont find anywhere else. Bluegreens The Cliffs at Long Creek resort in Ridgedale, Missouri offers five bedroom patio homes and two bedroom lodge villas for your next vacation. Find Maps, Photos, Videos and Area Information. Just a half mile west of the beauty of the Atlantic Ocean, the Jupiter Waterfront Inn sits at the southern gateway to a pristine, untouched world of ospreys, birds, alligators, and small animals and one of the nations wild and scenic rivers, the Loxahatchee. The Cabaret Dreamcade comes pre-built with 150 officially licensed games for all to enjoy. This arcade system comes with 2 separate player controls and Retro Reload software that allows you to upload all your favorite games. Pelican Pete is an exciting slot from Aristocrat that is reminiscent of casino-style slot machines. The sounds graphics and payouts will all make you feel like you are on the floor of the Bellagio. gt; Reinventing the workstation, powered by NVIDIA Volta and the most advanced technologies to meet the demands of next-generation real-time ray tracing, AI, simulation and visualization workflows. Find great local, shopping and travel deals at 50 to 90 off in Richmond, BC. One or Three Gel Manicures at Happy Dream Beauty Lounge (Up to 51 Off). C12. 50 for a Meal for Two, Featuring Two Regular Subs, Bags of ... The new NVIDIA SHIELD tablet K1 is a high-performance Android tablet, made to game with the SHIELD controller and GeForce NOW cloud gaming service. In American English, quot;phonographquot;, properly specific to machines made by Edison, was sometimes used in a generic sense as early as the 1890s to include cylinder-playing machines made by others

Full Text Available Abstract Background Histone deacetylase inhibitors (HDACIs induce hyperacetylation of core histones modulating chromatin structure and affecting gene expression. These compounds are also able to induce growth arrest, cell differentiation, and apoptotic cell death of tumor cells in vitro as well as in vivo. Even though several genes modulated by HDAC inhibition have been identified, those genes clearly responsible for the biological effects of these drugs have remained elusive. We investigated the pharmacological effect of the HDACI and potential anti-cancer agent Trichostatin A (TSA on primary T cells. Methods To ascertain the effect of TSA on resting and activated T cells we used a model system where an enriched cell population consisting of primary T-cells was stimulated in vitro with immobilized anti-CD3/anti-CD28 antibodies whilst exposed to pharmacological concentrations of Trichostatin A. Results We found that this drug causes a rapid decline in cytokine expression, accumulation of cells in the G1 phase of the cell cycle, and induces apoptotic cell death. The mitochondrial respiratory chain (MRC plays a critical role in the apoptotic response to TSA, as dissipation of mitochondrial membrane potential and reactive oxygen species (ROS scavengers block TSA-induced T-cell death. Treatment of T cells with TSA results in the altered expression of a subset of genes involved in T cell responses, as assessed by microarray gene expression profiling. We also observed up- as well as down-regulation of various costimulatory/adhesion molecules, such as CD28 and CD154, important for T-cell function. Conclusions Taken together, our findings indicate that HDAC inhibitors have an immunomodulatory potential that may contribute to the potency and specificity of these antineoplastic compounds and might be useful in the treatment of autoimmune disorders

': 'Aland Islands(Finland)', 'AZ': 'Azerbaijan', 'BA': 'Bosnia & Herzegovina', 'BB': 'Barbados', 'BD': 'Bangladesh', 'BE': 'Belgium', 'BF': 'Burkina Faso', 'BG': 'Bulgaria', 'BH': 'Bahrain', 'BI': 'Burundi', 'BJ': 'Benin', 'BL': 'Saint Barthelemy', 'BM': 'Bermuda', 'BN': 'Brunei', 'BO': 'Bolivia', 'BQ': 'Bonaire, Sint Eustatius and Saba', 'BR': 'Brazil', 'BS': 'The Bahamas', 'BT': 'Bhutan', 'BV': 'Bouvet Island', 'BW': 'Botswana', 'BY': 'Belarus', 'BZ': 'Belize', 'CA': 'Canada', 'CC': 'Cocos(Keeling) Islands', 'j': 'Democratic Republic of the Congo', 'CF': 'Central African Republic', 'CG': 'Republic of the Congo', 'CH': 'Switzerland', 'CI': 'Ivory Coast', 'CK': 'Cook Islands', 'CL': 'Chile', 'CM': 'Cameroon', 'CN': 'China', 'CO': 'Colombia', '1': 'Costa Rica', 'CU': 'Cuba', 'CV': 'Cape Verde', 'CW': 'Curacao', 'CX': 'Christmas Island', 'CY': 'Cyprus', 'CZ': 'Czech Republic', 'DE': 'Germany', 'DJ': 'Djibouti', 'DK': 'Denmark', 'DM': 'Dominica', 'DO': 'Dominican Republic', 'DZ': 'Algeria', 'EC': 'Ecuador', 'EE': 'Estonia', '

FromSampleBuffer:(CMSampleBufferRef) sampleBuffer { // Get a CMSampleBuffer's Core Video image buffer for the media data CVImageBufferRef imageBuffer = CMSampleBufferGetImageBuffer(sampleBuffer); // Lock the base address of the pixel buffer CVPixelBufferLockBaseAddress(imageBuffer, 0);

// Get the number of bytes per row for the pixel buffer void *baseAddress = CVPixelBufferGetBaseAddress(imageBuffer); // Get the number of bytes per row for the pixel buffer size_t bytesPerRow = CVPixelBufferGetBytesPerRow(imageBuffer); // Get the pixel buffer width and height size_t width = CVPixelBufferGetWidth(imageBuffer); size_t height = CVPixelBufferGetHeight(imageBuffer);

// Create a device-dependent RGB color space CGColorSpaceRef colorSpace = CGColorSpaceCreateDeviceRGB();

// Create a bitmap graphics context with the sample buffer data CGContextRef context = CGBitmapContextCreate(baseAddress, width, height, 8, bytesPerRow, colorSpace, kCGBitmapByteOrder32Little | kCGImageAlphaPremultipliedFirst); // Create a Quartz image from the pixel data in the bitmap graphics context CGImageRef quartzImage = CGBitmapContextCreateImage(context); // Unlock the pixel buffer CVPixelBufferUnlockBaseAddress(imageBuffer,0);

// Free up the context and color space CGContextRelease(context); CGColorSpaceRelease(colorSpace);

// Create an image object from the Quartz image UIImage *image = [UIImage imageWithCGImage:quartzImage]; // Release the Quartz image CGImageRelease(quartzImage);

return (image); }

In those strange old times, when fantastic dreams and madmen's reveries were realized among the actual circumstances of life, two persons met together at an appointed hour and place. One was a lady, graceful in form and fair of feature, though pale and troubled, and smitten with an untimely blight in what should have been the fullest bloom of her years; the other was an ancient and meanly-dressed woman, of ill-favored aspect, and so withered, shrunken, and decrepit, that even the space since she began to decay must have exceeded the ordinary term of human existence. In the spot where they encountered, no mortal could observe them. Three little hills stood near each other, and down in the midst of them sunk a hollow basin, almost mathematically circular, two or three hundred feet in breadth, and of such depth that a stately cedar might but just be visible above the sides. Dwarf pines were numerous upon the hills, and partly fringed the outer verge of the intermediate hollow, within which there was nothing but the brown grass of October, and here and there a tree trunk that had fallen long ago, and lay mouldering with no green successor from its roots. One of these masses of decaying wood, formerly a majestic oak, rested close beside a pool of green and sluggish water at the bottom of the basin. Such scenes as this (so gray tradition tells) were once the resort of the Power of Evil and his plighted subjects; and here, at midnight or on the dim verge of evening, they were said to stand round the mantling pool, disturbing its putrid waters in the performance of an impious baptismal rite. The chill beauty of an autumnal sunset was now gilding the three hill-tops, whence a paler tint stole down their sides into the hollow

-work system similar to Adam Back's Hashcash [6], rather than newspaper or Usenet posts. The proof-of-work involves scanning for a value that when hashed, such as with SHA-256, the hash begins with a number of zero bits. The average work required is exponential in the number of zero bits required and can be verified by executing a single hash. For our timestamp network, we implement the proof-of-work by incrementing a nonce in the block until a value is found that gives the block's hash the required zero bits. Once the CPU effort has been expended to make it satisfy the proof-of-work, the block cannot be changed without redoing the work. As later blocks are chained after it, the work to change the block would include redoing all the blocks after it. The proof-of-work also solves the problem of determining representation in majority decision making. If the majority were based on one-IP-address-one-vote, it could be subverted by anyone able to allocate many IPs. Proof-of-work is essentially one-CPU-one-vote. The majority decision is represented by the longest chain, which has the greatest proof-of-work effort invested in it. If a majority of CPU power is controlled by honest nodes, the honest chain will grow the fastest and outpace any competing chains. To modify a past block, an attacker would have to redo the proof-of-work of the block and all blocks after it and then catch up with and surpass the work of the honest nodes. We will show later that the probability of a slower attacker catching up diminishes exponentially as subsequent blocks are added. To compensate for increasing hardware speed and varying interest in running nodes over time, the proof-of-work difficulty is determined by a moving average targeting an average number of blocks per hour. If they're generated too fast, the difficulty increases. 5. Network The steps to run the network are as follows:

The village was once a quiet little fishing village but is now a vibrant coastal town that offers a variety of accommodation, dining, shopping, and leisure options. Back to Home Page also see A Short Bio. Life and Times of Measurex Late of Cupertino, California Once the Big Frog in the small pond of ... The overpopulation of deer in my area have made everything on the plant list an appetizer. I have found that there is nothing they wont eat-including poisonous Datura. Peonies, Solomons seal, gladiolus, bleeding hearts, Rose of Sharon, zinnia, columbine, etc. etc. Daylillies for dessert. Why plant the shrub rose, HomeRun and not the more popular KnockOut. Home Run is a single petal rose and more orangered rather than scarlet red. Safe and Poisonous Garden Plants - Safe Plants (by common name) Schipka laurel (Prunus laurocerasus Schipkaensis) is a dense growing evergreen shrub with lustrous evergreen foliage and clusters of small white flowers in the spring. Big Blog Of Gardening 187; Organic Flower Gardening 187; Rabbits and Deer Wont Eat These Flowers, Shrubs, Herbs, and Trees 171; Crop rotation for your vegetable garden ... Ponies are taxonomically the same animals as horses. The distinction between a horse and pony is commonly drawn on the basis of height, especially for competition purposes Find the answer to what is a Chocolate soldier plant. Answer includes a photo of Episcia cupreata (Chocolate Soldier Plant) White Snakeroot (Eupatorium rugosum) is native to moist woodland areas in most eastern and midwestern states (U. It grows in average, moist, well ... Important: Because

. Tata Motors has auto manufacturing and assembly plants in Jamshedpur, Pantnagar, Lucknow, Sanand, Dharwad, and Pune in India, as well as in Argentina, South Africa, Great Britain and Thailand. It has research and development centres in Pune, Jamshedpur, Lucknow, and Dharwad, India and in South Korea, Great Britain and Spain. Tata Motors' principal subsidiaries purchased the English premium car maker Jaguar Land Rover (the maker of Jaguar and Land Rover cars) and the South Korean commercial vehicle manufacturer Tata Daewoo. Tata Motors has a bus-manufacturing joint venture with Marcopolo S.A. (Tata Marcopolo), a construction-equipment manufacturing joint venture with Hitachi (Tata Hitachi Construction Machinery), and a joint venture with Fiat Chrysler which manufactures automotive components and Fiat Chrysler and Tata branded vehicles. Founded in 1945 as a manufacturer of locomotives, the company manufactured its first commercial vehicle in 1954 in a collaboration with Daimler-Benz AG, which ended in 1969. Tata Motors entered the passenger vehicle market in 1991 with the launch of the Tata Sierra, becoming the first Indian manufacturer to achieve the capability of developing a competitive indigenous automobile. In 1998, Tata launched the first fully indigenous Indian passenger car, the Indica, and in 2008 launched the Tata Nano, the world's cheapest car. Tata Motors acquired the South Korean truck manufacturer Daewoo Commercial Vehicles Company in 2004 and purchased Jaguar Land Rover from Ford in 2008. Tata Motors is listed on the (BSE) Bombay Stock Exchange, where it is a constituent of the BSE SENSEX index, the National Stock Exchange of India, and the New York Stock

, which was the son of Eliezer, which was the son of Jorim, which was the son of Matthat, which was the son of Jonan, which was the son of Simeon, which was the son of Juda, which was the son of Joseph, which was the son of Mattatha, which was the son of Eliakim, Which was the son of Melea, which was the son of Menan, which was the son of Mattatha, which was the son of Nathan, which was the son of David, Which was the son of Jesse, which was the son of Obed, which was the son of Booz, which was the son of Salmon, which was the son of Naasson, Which was the son of Aminadab, which was the son of Aram, which was the son of Esrom, which was the son of Phares, which was the son of Juda, Which was the son of Jacob, which was the son of Isaac, which was the son of Araham, which was the son of Phalec, which was the son of Heber, which was the son of Sala, Which was the son of Cainan, which was the son of Arahamad, which was the son of Sem, which was the son of Noe, which was the son of Lamech, Which was the son of Mathusala, which was the son of Enoch, which was the son of Seth, which was the son of Adam, which was the son of God

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